Predication and Argument Structure in Afghan Wakhi

by

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A dissertation accepted and approved in partial fulfillment of the

requirements for the degree of

Doctor of Philosophy

in Linguistics

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University of Oregon

Summer 2026

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DISSERTATION ABSTRACT

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Doctor of Philosophy in Linguistics

Title: Predication and Argument Structure in Afghan Wakhi

Afghan Wakhi [ISO-639: wbl] is a Southeastern Iranian language of the Pamir group that is spoken in northeastern Afghanistan. After briefly introducing the Afghan Wakhi people, the sound system of the language, and selected syntactic facts, this study turns to focus on predication strategies, valence alterations, and argument structure patterns found in different areas of the grammar.

Three different predication strategies are found in Afghan Wakhi: lexical verbs, nonverbal predicates, and light verb constructions. Verbal predicates occupy a relatively small portion of the predicational landscape, yet they are the only predication strategy that has been investigated to any degree in previous studies.

Comparing the different types of nonverbal predicates reveals that Afghan Wakhi has three constructions used with basic (pragmatically neutral) nonverbal predicates. Of these, one macro-construction is used for nominal NP predicates, AP predicates, and locative predicates. One construction is used for existential clauses, and one is used for possessive clauses. There are also a number of marked nonverbal clause constructions, which merit further study.

Light verb constructions (LVCs) are a highly common and diverse predication strategy in Afghan Wakhi. At present, 378 distinct types of LVCs are attested in the corpus used as the primary data for this study. This study sorts LVCs associated with five frequent light verbs into semantic clusters based on preverb type, syntactic structure, and argument structure; these clusters and their relationships to each other are visually represented via semantic maps.

The inventory of valence-changing constructions in Afghan Wakhi includes three causatives and one passive. Several patterns of light verb alternations are productively associated with valence alternations. Both valence-changing constructions and LVCs exhibit some interesting mismatches between semantics and morphology. These mismatches include Dative-marking on the sole object of a clause, Genitive-marking on some core semantic arguments in malefactive situations, and avalent weather and environment predicates.

ACKNOWLEDGEMENTS

This dissertation is a testament to the faithful love and support of many people, both near and far. Chief among these are the Afghan Wakhi community, who have so generously shared their language, culture, and friendship with me since 2013. In particular, I wish to thank Boi Mohammad Faqiri, Juma Gul Payman, and Faiz Ali Ulfat for their selfless and enduring collaboration, which has persisted across many years, miles, and time zones.

I am beyond grateful to my advisor, Professor Spike Gildea, for being a "difference that makes a difference." You have been so much more than just a teacher—you have been a coach, a challenger, a mentor, a champion, a listener, and an encourager. Best of all, you are also my friend. I would also like to thank my committee members, Don Daniels, Doris L. Payne, Shahar Shirtz, and Zhuo Jing-Schmidt, for their stimulating comments, questions, and discussions, which inspired me to think and write about Afghan Wakhi in new ways. I am grateful to the entire committee, but especially Spike and Doris, for kindly pushing me to achieve my best rather than stopping with something that was only satisfactory. The entire dissertation, but particularly Chapters 3 and 6, are so much better as a result.

I wish to thank my friends and former colleagues at SIL Global, whose encouragement and administrative support made it possible for me to pursue doctoral studies. I am also grateful to the Pike Center for Integrative Scholarship (2023, 2025) and the Firebird Foundation for Anthropological Research (2024) for providing funding for fieldwork and data processing.

Many friends have contributed to my life and learning over the past few years. Time and space do not allow me to name them all, but I would like to thank several people in particular have been bright spots of light in the long PhD tunnel: Emma Mazzuchi, my office-mate, thought partner, and culinary companion; Carissa Diantoro, encourager and phonetician extraordinaire;

Allison Taylor-Adams, a fellow knitting nerd and a much-needed cheerleader from across the PhD finish line; Becky Paterson, an endless source of good ideas, good companionship, and good coffee; Kris and Jess Kyle, fast friends and dependable sounding boards; and Hannah Stamp, my paddleboarding buddy and sanity checker during my dissertation year.

Finally, I am eternally grateful to my parents, Sam and Lisa SanGregory. For as long as I can remember, you have cultivated my curiosity and encouraged my love for language. Your steadfast love and endless encouragement know no bounds. You bear all things, believe all things, hope all things, and endure all things. I love you!

DEDICATION

In loving memory of my grandfather, John Francis SanGregory (1929-2025), who set an example of insatiable curiosity and lifelong learning.

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CHAPTER 1

INTRODUCTION

Wakhi [ISO 639: wbl, Glottocode: wakh1245] is a Southeastern Iranian language (Indo-European > Indo-Iranian > Iranian > Eastern > Southeastern) of the putative Pamir group. This study focuses on Afghan Wakhi, the variety spoken by approximately 17,000 people living in northeastern Afghanistan.

This dissertation investigates several questions related to the morphosyntax of predication in Afghan Wakhi: (1) How do speakers of Afghan Wakhi communicate different predicational concepts? (2) What argument structure constructions (i.e., mapping of semantic arguments to grammatical relations) are available for use with different predicational strategies? (3) How are different argument structure constructions coded morphosyntactically? (4) What constructions does Afghan Wakhi use to change the valence of a predicate, and how do those constructions affect argument structure?

To address these questions, I examine three predication strategies used in Afghan Wakhi: lexical verbs, nonverbal predicates, and light verb constructions. Each verb lexeme has three stems (nonpast, past, and perfect), and each stem type has its own set of inflectional morphology and grammatical and / or discourse functions. Lexical verbs comprise a fairly small, closed class; therefore, using a lexical verb is not the predominant predication strategy in Afghan Wakhi.

Nonverbal predicate constructions are those in which something other than a lexical verb functions as the semantic predicate. In Afghan Wakhi, there are three basic constructions used for nonverbal predicates: one for predicates comprising a nominal NP, an adjective phrase, or a locative phrase (adverb, adverbial PP, or locative NP), one for existential clauses, and one for possessive clauses. The existential construction is the only one for which a copula is required; for

the others, the copula is optional and is used primarily to indicate a tense other than nonpast, a mood other than indicative, or negative polarity.

Light verb constructions (LVCs) are perhaps the most common predication strategy in Afghan Wakhi. LVCs are composed of a preverb (PV), which conveys the primary semantics of the LVC, and a light verb (LV) that is somewhat (although not entirely) semantically bleached. Together, the collocated PV and LV form a predicate that may be more or less compositional in meaning and that has a unique argument structure. This study groups sets of PVs that correlate with the same LV according to shared formal and semantic properties. While many LVCs have fairly typical argument structures, others exhibit surprising semantic-morphosyntactic mismatches. These mismatches include (a) the presence of a single, Dative-marked object (i.e., an apparent indirect object without a direct object); (b) apparent core semantic arguments (Experiencers and Goals) coded as Genitive-marked adnominal possessors inside the PV or another constituent, with associated malefactive semantics; and (c) 3SG verbal morphology in avalent (argumentless) constructions.

Lexical verbs and LVCs may be used in various valency-changing constructions that either increase or decrease the valence of the predicate. These include a causative morpheme and two periphrastic causative constructions, as well as an analytic passive construction. In addition, some PVs collocate with two or more LVs that are associated with different valency effects.

The remainder of Chapter 1 is structured as follows. First, I introduce the Afghan Wakhi people (§1.1) and the variety of Wakhi they speak (§1.2). Next, I review the linguistic literature on Afghan Wakhi (§1.3). I then describe the history of my interactions with the Afghan Wakhi people (§1.4) and my research corpus and methods (§1.5). In §1.6, I define important terms and

outline my analytical approach. Section §1.7 contains a short typological sketch of Afghan Wakhi, and §1.8 provides a roadmap for the remainder of the dissertation.

1.1. The Afghan Wakhi People

An estimated 52,000 people in Afghanistan, Pakistan, Tajikistan, and the People's Republic of China (PRC) speak Wakhi as their first language. Wakhi (ethnic group) and Wakhani (language) are Persian exonyms; the Wakhi people use the autonyms *çik* for themselves and *çik zik* or *çikwɔr* for their language (Eberhard, Simons & Fennig 2024).

The Wakhi people of Afghanistan live in 42 villages along the Panj River, one of the primary tributaries of the Amu Darya (i.e., the Oxus River), in the Wakhan Corridor. The Wakhan Corridor is a narrow valley in the far northeastern part of Badakhshan Province that is sandwiched between the Hindu Kush mountains to the south and the Pamir mountains to the north. This part of Afghanistan shares borders with Pakistan, Tajikistan, and the People's Republic of China (PRC) (Eberhard, Simons & Fennig 2024). Badakhshan, the most north-eastern province of Afghanistan, can be seen in the map displayed in Figure 1.1. The areas in which Wakhi is spoken can be seen in the map given in Figure 1.2. The village of Khandud,[1] which is located about halfway up the Wakhan Corridor, is both the governmental district center and the divider between the lower and middle dialect areas. The Afghan Wakhi villages stretch from Putr (near Ishkashim)[2] to Sarhad,[3] with elevations ranging from 2,100 – 3,650 m. Afghan Wakhi villages lie along the Tajik border until the village of Gaz Khan, where the Afghan Wakhan widens to encompass both banks of the river.

[1] *Хандуд* on the map.

[2] *Ишкашим* on the map.

[3] *Сархад* on the map.



Figure 1.1. Map showing the location of Badakhshan Province within Afghanistan (CC BY-SA 3.0 figure created by Wikimedia Commons user Golbez, retrieved 20 May 2025)

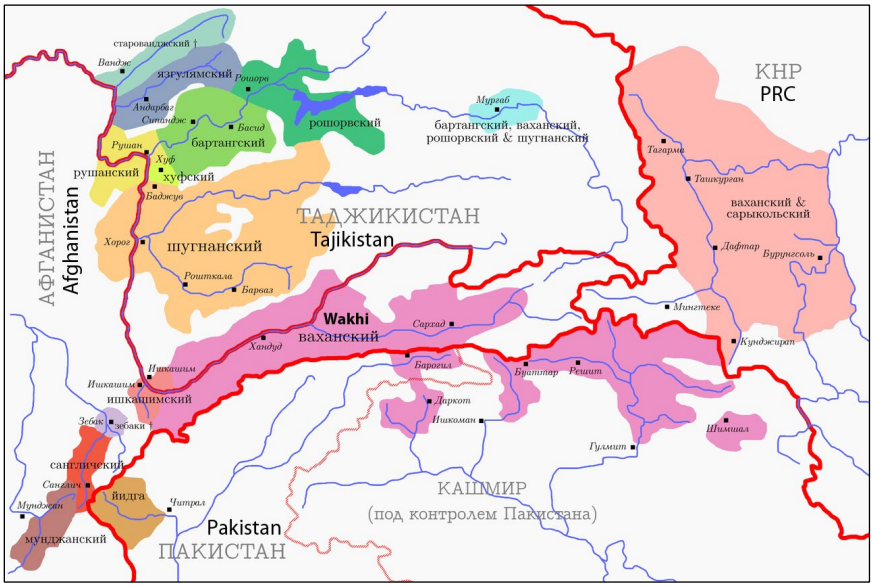


Figure 1.2. Areas in Central Area where Wakhi (pink) is spoken (CC BY-SA 4.0 figure created by Wikimedia Commons user DrHoslow, retrieved 11 March 2023; English labels added by the author)

The elevation and rugged terrain make the Wakhan Corridor one of the most remote and difficult-to-access areas in Afghanistan. A single dirt road runs from one end of the Wakhan to

the other. In winter, the river is crossable via makeshift footbridges, but in summer, snowmelt from the surrounding mountains causes the river to flood and become uncrossable except at a few permanent vehicle bridges. Summer snowmelt also creates side streams that gush down the mountains, causing floods, rockfalls, and landslides that can block or damage the road. In winter, many side streams dry up, but those that remain freeze, and the resulting ice makes the road hazardous.

The Afghan Wakhan has an arid climate, with average annual precipitation estimated to be less than 23 cm. Several high peaks in the Pamir and Hindu Kush mountains on either side of the valley are snowcapped year-round. Winter in the Wakhan is long, cold, and dark, with temperatures commonly below freezing. The mountains block all but a few hours of direct sunlight from reaching the floor of the valley, and some villages on the southern side of the valley are in the shadow of the mountains all winter long. In contrast, summer in the Wakhan is short but pleasant. Daytime temperatures occasionally reach as high as 30°C, but the heat dissipates quickly at night and temperatures drop into the teens. Although the weather is not exceptionally hot, the high elevation and thinner atmosphere make the sun intense, and many Afghan Wakhi are fairly dark-complected from spending much of their daily lives outdoors.

The Afghan Wakhi are agro-pastoralists who practice subsistence farming. They dig complex systems of irrigation ditches to direct glacial runoff to water their fields, which they plow with teams of steers. The Afghan Wakhi traditionally cultivate grains (wheat, barley, millet) and legumes (peas, beans) and raise livestock (cattle, sheep, goats, yaks, donkeys). In the past several years, people have begun to supplement their traditional crops with potatoes and carrots, along with vegetables grown in small family greenhouses. They purchase or trade for items they cannot produce themselves, such as rice, pasta, oil, sugar, fabric, etc. The daily lives

of the Afghan Wakhi are consumed with tending their fields and livestock and raising their families. They live their lives by the sun, which makes for long days in summer and much shorter days in winter. Large extended families live together in one house (15-20 people per household). Each summer, about one-third of the population moves to high-elevation mountain pastures in the Pamir Mountains to graze the flocks and herds while the rest stay in the villages to tend the crops.

The Afghan Wakhi belong to the Ismaili sect of Shi'a Islam. Ismaili beliefs and practices related to the Islamic pillars of prayer and fasting are notably different from those held by the mainstream Sunni population of Afghanistan; these and other religious differences have historically made the Afghan Wakhi targets of prejudice and persecution. In their daily lives, the Afghan Wakhi blend Ismaili beliefs and practices with those from folk Islam, some of which trace back to Zoroastrian traditions. For example, the most important annual festival is the New Year, which they call *ʃɔgɨn* and celebrate on the vernal equinox (first day of spring) according to ancient Zoroastrian customs.

The Afghan Wakhi are both patrilineal and patrilocal. Intermarriage with people from other ethnicities is infrequent; when it does occur, the non-Wakhi spouse is usually from another Ismaili Pamiri people group, such as the Shughni or Ishkashimi. The majority of marriages are monogamous, and men who do have multiple wives never take more than two simultaneously. Afghan Wakhi marriages are arranged, but a young man can ask his parents to arrange his marriage with a young woman of his choosing. The marriage arrangement process begins when a delegation of several relatives and friends from the prospective groom's family go to the prospective bride's father to request his permission for the couple to marry (*t͡ʃəlgɐk*). The delegation often goes multiple times before the father grants permission. Once permission has

been granted, the two families agree on an engagement date. The prospective groom's family sends supplies (rice, oil, sweets, etc.) for the engagement feast and gifts for members of the prospective bride's family. At the appointed time, a small group of friends and relatives accompany the prospective groom to the prospective bride's home for the engagement ceremony (called *vul kəʧɐk* or *ʃtrʊç kəʧak*) and feast.

An Afghan Wakhi wedding takes place in the winter, anytime from a few months to a few years after the engagement. Wedding preparations begin when the prospective groom's father, accompanied by several neighbors, visits the prospective bride's father to negotiate the bride price (*qliŋg*), which includes all the necessary supplies for the wedding, and to set the date for the wedding. Wedding guests gather at the home of the groom's family for a day of traditional celebrations before traveling to the home of the bride. An evening of feasting takes place before the wedding ceremony is performed (*nikɔ t͡səɾɐk*), after which the groom (*ʂɔni*) is seated next to his bride (*bidjɐnd͡z*). The next day, both families travel to the groom's home for three more days of celebrations. During this time, the bride and groom sit in a curtained-off area while the wedding party takes place around them. At the end of the three days, the best man (*pədɐrxɔn*) ceremoniously removes most of the bride's jewelry (the portion of the bride price that the groom's family gives to her, instead of to her family) in a ritual referred to as *ruj kəʧɐk*.

Afghan Wakhi dress is very traditional, particularly for women and children. Women and girls wear a long-sleeved, full-skirted dress (*pirɐn*) over long, loose pants (*təmbɨn*).[4] Both dresses and pants are typically handmade from brightly colored and patterned fabrics; favorite colors include red, pink, and purple. To be fully dressed, a woman must also wear some kind of vest (*wɔskɐʧ*) or jacket (*kərti*) over her dress. Jackets are often purchased, while vests are usually

[4] I use "pants" in the American sense.

handmade (either knitted or sewn with brightly colored embroidery). Adolescent girls and women cover their hair with a scarf (*t͡ʃil*). Traditionally, married women wear an embroidered cap (*skid*) under their scarf, but not all younger wives follow this tradition. Clothing for men and boys ranges from the traditional Afghan tunic and loose cotton pants (*jiktɐ təmbɨn*) to Western-style shirts and trousers. Like women, men typically don some kind of jacket or vest as their outermost layer. Men's clothing is more utilitarian in color (tans, browns, grays) than women's clothing, although outfits for special occasions may be more varied and vibrantly hued.

Very little is known about the history and origins of the Wakhi people. However, it does seem likely that the Afghan Wakhi have inhabited the Wakhan Corridor for hundreds, if not thousands, of years. According to their own traditional histories, the Afghan Wakhi have inhabited the Wakhan Corridor for 5,000 years. The earliest known mention of the Wakhan and its inhabitants occurs circa 1300 A.D. in Marco Polo's (1993) travelogue recounting his journey to China via Central Asia. Polo observes that the area called "Vokhan" is inhabited by people who "have a peculiar language" (1993: 171). Like several other ethnic groups in northern Afghanistan, the Afghan Wakhi attribute at least some of their ancestry to the Greek armies who came to the region under the command of Alexander the Great during his campaign in Bactria and Sogdiana (330-327 B.C.) (cf. Burns 1834: 214–218; Rawlinson 1969: 35–47). Although no historical records exist that confirm or invalidate this claim of Greek ancestry, it is plausible given that Alexander married a Persian wife during this period and encouraged his troops to do the same (Rawlinson 1969: 46–47).

1.2. The Afghan Wakhi Language Variety

Languages in the Eastern branch of the Iranian family have long been a challenging group of languages to classify in terms of their internal phylogenetics. The combination of

widespread locations, difficult access, and lack of historical records are just a few of the factors that have made it difficult to study these languages, which in turn contributes to a poor understanding of how they are related to one another. In particular, historical linguists debate whether the languages spoken in the region of the Pamir Mountains in Central Asia comprise a family, a *Sprachbund*, or a dialect chain (Skjærvø 1989; Wendtland 2009; Novák 2014). In this dissertation, I use "Pamir" to refer to this group of languages (Wakhi, Shughni, Munji, Yidgha, Ishkashimi, Yazghulami, and Sarikoli) regardless of whether they comprise a genetic unit.

Varieties of Wakhi are spoken as a first language by an estimated 52,000 people in Afghanistan, Pakistan, Tajikistan, and the PRC. There are several mutually intelligible varieties of Wakhi. Three varieties borrow from the language of wider communication (LWC) of the country in which they are spoken: Dari in Afghanistan, Russian in Tajikistan, and Urdu in Pakistan. Many Wakhi speakers in the PRC are bilingual in Sarikoli, a Pamir language that has prestige among the minority communities in the area (Kim 2017), so it is possible that some Sarikoli borrowings may be used in the variety of Wakhi spoken in the PRC.

Some researchers have classified Wakhi as an endangered language on the basis of factors such as population size, lack of institutional support, and multilingualism (cf. Grünberg & Stéblin-Kamensky 1988a; Hughes 2014). In Afghanistan, villages at the southwestern end of the Wakhan Corridor have a greater degree of contact with Dari speakers, but villages in the middle and upper Wakhan have little to no regular contact with native speakers of Dari. Throughout the Afghan Wakhan, Wakhi is transmitted from one generation to the next in the home. The language is used in all domains except education and the district government (regional branch of the national government); the language of instruction in the government-run schools is Dari, one of the national languages of Afghanistan. Language development activities, including

orthography development, language and culture documentation, and mother-tongue literacy, have been ongoing in various forms since the early 2000s. Because of the relative isolation of the Afghan Wakhi people, the widespread use and intergenerational transmission of the language, and the ongoing language development efforts, I do not agree with classifying the Afghan variety of Wakhi as endangered. Instead, I believe it is more accurate to describe Afghan Wakhi as a vital language, and I concur with the *Ethnologue*'s assessment of it as a Level 5 (Developing) language on the EGIDS scale (Eberhard, Simons & Fennig 2024).

1.3. Previous Research on Wakhi

Wakhi has historically not been well documented or described. The relative paucity of research on Wakhi is not surprising given the remoteness of the areas in which the Wakhi people live. The difficult journey required to reach those areas, not to mention the chronic unrest and series of wars that have plagued Central Asia for thousands of years, has hidden the Wakhi people and their language from all but the most hardy of outsiders. In the following sections, I review the available descriptions of Wakhi, organized broadly by area of research.

1.3.1 Grammatical Descriptions

The earliest known linguistic description of Wakhi is found in R. B. Shaw's book *On the Ghalchah languages* (1876). This book is also the only description focused on the variety of Wakhi spoken in what is now the PRC, although neither country borders nor dialectal differences would have been the same at that time as they are today since the Durand Line was not demarcated until nearly twenty years later.[5] Shaw's grammar sketch of Wakhi focuses primarily

[5] The Durand Line was drawn in 1893 for the purpose of improving international relations and trade. It established Afghanistan as a buffer zone between British India and Russia during the "Great Game" era and, with only a few modifications from the original, continues to serve as the border between Afghanistan and modern-day Pakistan (Ansary 2012; Hopkirk 1992).

on the verbal system, with more cursory descriptions of nouns, pronouns, case marking, adjectives, and numbers.

The Pakistani variety of Wakhi, which is variously referred to as the Hunza or Gojal variety in the literature, was first described by Norwegian linguist Georg Morgenstierne in his (1938) book entitled *Indo-Iranian frontier languages, Vol. II: Iranian Pamir languages (Yidgha-Munji, Sanglechi-Ishkashmi, and Wakhi*.[6] Morgenstierne discusses the phonetic inventory, phonology, and morphology of each language named in the title of his book, with a particular focus on the language's historical development from ancient Iranian. He supplements his section on Wakhi with one sample text and a lexicon.

Although it was not published until 1958, D. L. R. Lorimer's two-volume book entitled *The Wakhi language* was written based on fieldwork he conducted in Pakistan up to three decades earlier.[7,8] It remains the most comprehensive linguistic description of any variety of Wakhi to date. Volume One presents a phonetic sketch and a detailed grammar, while Volume Two contains a lexicon and transcriptions of several texts.

In the mid-1900s, Soviet linguists began to take an interest in the minority languages of what was then the U.S.S.R. As a minority language of Tajikistan, which was at that time part of the Soviet Union, Wakhi was included in this interest. Several works on Wakhi were written in Russian during this era, including a book called *Vakhanskii jazyk* (Grünberg & Stéblin-Kamensky 1976). Also available in French under the title *La langue wakhi* (Grünberg & Stéblin-

[6] Today, Yidgha and Munji are recognized as individual languages, as are Sanglechi and Ishkashimi (cf. Eberhard, Simons & Fennig 2024).

[7] In the introduction to the book, Lorimer notes that he did some preliminary fieldwork in 1921 when he was in the employ of the British government, but that he collected the majority of the data in 1935 (1958: 4).

[8] Lorimer shared his unpublished materials with Morgenstierne, who referred to them (and other materials, including his own fieldwork) in writing his (1938) description of Wakhi, which predated Lorimer's book by twenty years.

Kamensky 1988a; Grünberg & Stéblin-Kamensky 1988b), this two-volume edition includes an ethnographic sketch, a corpus of transcribed texts (primarily from the Tajik variety with a few from the Afghan variety), a grammar sketch, a phonetic sketch, and a 15,000-word dictionary.

The book *The Iranian languages* (Windfuhr 2009) includes a chapter dedicated to Wakhi (Bashir 2009). In this chapter, Elena Bashir provides a sketch grammar of Wakhi that includes sections on phonetics, phonology, and grammar. Although in places she compares differences across varieties, she primarily relies on data from the Tajik variety, particularly in her description of morphosyntactic features.

1.3.2 Differential Subject Marking

In his paper "The decay of ergativity in Pamir languages" (1980), John R. Payne describes several unique case marking and alignment patterns found across the Pamir languages. He argues that the Pamir languages are at different stages in the process of shifting from older ergative constructions to nominative ones in the past and perfect tenses (cf. Haig 2008), and that these different levels of "decaying" ergativity are responsible for the typologically rare alignment types exhibited by these languages. Payne describes one dialect of Wakhi as having an "oblique subject construction" (1980: 180–181), i.e., differential subject marking (DSM), that occurs in both transitive and intransitive clauses and that is not found in any other Pamir language.

Elena Bashir picks up on Payne's work with her article "Beyond split-ergativity: Subject marking in Wakhi" (1986). Following Payne, Bashir refers to DSM in Wakhi as the "oblique subject construction" (1986: 16). She hypothesizes that the oblique subject construction primarily has discourse functions, such as indicating a higher degree of agency and / or volitionality on the part of the subject, emphasizing the identity of the subject, and assigning

some type of focus to the subject within the immediate discourse context, as well as signaling an event that is significant in the progression of the narrative.

Differential subject marking is also the topic of my MA thesis, entitled *Differential subject marking in Wakhi* (SanGregory 2018). In the thesis, I describe the inventory of nominal and pronominal case marking in Afghan Wakhi before examining factors that condition DSM, which is indicated via ACC2 case forms for 1SG and 2SG subjects used with past and perfect verb forms.[9] I then suggest that the primary function of DSM in Wakhi is to mark emphasis. I draw on the descriptions and analysis from this thesis in §3.1.3 of the present dissertation.

1.3.3 Clitics

David Erschler (2010) includes data from Wakhi in a study of clitics in East Iranian languages. He observes that clitics previously thought to adhere to Wackernagel's Law (i.e., second-position or second-word clitics) can be found farther to the right in their clause. He proposes a new class of clitic, the Almost Wackernagel Clitic, to refer to clitics that exhibit this kind of optionality in the clausal locations where they occur. Erschler's paper sparked an interest in Wakhi clitics that is evident from the flurry of subsequent publications on the topic.

In his MA thesis entitled *Wakhi agreement clitics*, Todd Hughes (2011) analyzes subject-indexing clitics in the Hunza dialect as past tense subject-agreement morphemes. Working within the Minimalist framework, his goal is to locate the position at which clitics are base-generated in the clause. In Hughes's data, all 1SG and 2SG subjects in the past tense appear in the Accusative case, which seems to be the only way of marking such subjects in the Pakistani variety (Backstrom, p.c.).

[9] In previous work, I analyzed Afghan Wakhi as having two accusative cases (ACC1 and ACC2). In this dissertation, I call these cases the Accusative and Default cases, respectively (cf. §3.1.3).

Hughes furthered his work on Wakhi with his PhD dissertation, *Approaches to Wakhi subject-oriented past tense clitics* (2014). Although he based his earlier (2011) work on the Pakistani variety of Wakhi, Hughes (2014) uses data from the Tajik variety. His primary goal in the (2014) work is to expand his description and analysis of Wakhi clitics, but Hughes also provides a typological sketch that introduces topics such as basic word order, nouns, pronouns, case marking, numbers, quantifiers, demonstratives, adjectives, adverbs, prepositions, verbs, the copula, and various types of subordinate clauses.

Like Erschler and Hughes, Zuzanna Fuchs (2015) focuses on agreement clitics in the Tajik variety of Wakhi in her paper "Second position and 'floating' clitics in Wakhi." Unlike Erschler and Hughes, Fuchs divides the clitics into two different types: (1) doubled pronominal clitics, which occur in Wackernagel position, and (2) possessive clitics, which occur farther to the right in the clause and which she analyzes as coreferential with an external possessor.

The article "Towards a new analysis of Wakhi clitics" (SanGregory 2015) contributes to the discussion of Wakhi clitics from the perspective of Lexical-Functional Grammar (LFG). Like previous analyses of Wakhi clitics, this (2015) paper takes a formal approach and proposes a phrase structure rule modeling of the variations in clitic placement exhibited in the data.

1.3.4 Discourse, Semantics, and Pragmatics

While most of the work on Wakhi has dealt with grammatical topics, several publications have been devoted to topics related to discourse features, semantics, and pragmatics. The first of these was Simone Beck's MA thesis entitled *Backgrounding and foregrounding, prominence, and highlighting in Afghan Wakhi* (2013). In this thesis, Beck investigates the verb salience scheme and various particles, as well as other discourse devices such as rhetorical questions and pre- and post-posing of constituents, exhibited in four discourse genres (narrative, procedural,

behavioral, and expository). She describes the discourse effects of these different devices and concludes that several devices may be combined within a text to emphasize the intended effect.

Jaroslava Obrtelovà analyses the discourse structure of Wakhi narratives in two different publications. In her MA thesis, *Narrative structure of Wakhi oral stories* (2017), she focuses specifically on spontaneously narrated stories produced by regular speakers of Tajik Wakhi. Subjects of analysis include verb tenses and their functions in temporal sequencing; narrative structure and devices used to transition between major discourse units; methods used by speakers to insert evaluative comments; and other sociolinguistic and anthropological aspects commonly found in narratives.

Obrtelovà furthers her investigation of Tajik Wakhi narratives in her (2019) PhD dissertation, *From oral to written: A text-linguistic study of Wakhi narratives*. As background for her study, Obrtelovà describes select morphosyntactic topics related primarily to verbs, clause structure, and clause combining (including both coordination and subordination). She then compares the structure and devices used in several types of narratives, including spontaneous oral, planned oral, and written narratives. She shows that the devices used, such as amount of background vs. foreground information, type of background information, type of deixis shift, and story development techniques, vary in frequency across the different narrative types. Based on her findings, she concludes that these types do not form discrete categories, but rather a spectrum ranging from spontaneous oral narratives on the one end to planned written narratives on the other.

The paper “An information structure analysis of locative, existential, and possessive clauses in Wakhi” (SanGregory 2025a) examines word order similarities and variations across three types of nonverbal clause constructions. Taking a usage-based approach, this (2025a) paper

proposes two pragmatically motivated constructions, one for clauses with basic information structure and one for presentational clauses, to account for word order variations in locative, existential, and possessive clauses in Afghan Wakhi. In so doing, the paper not only affirms the relationship between information structure and syntax, but also lays the foundation for future research into how these two domains interact in other areas of Wakhi syntax.

The first article about Wakhi to venture into the realm of semantics is "A pilot study of spatial frames of reference in Afghan Wakhi" (SanGregory 2025b). This article reports on the data from one dyad of speakers who participated in a referential communication task. It suggests that a direct frame of reference (FoR) is the primary FoR used by speakers of Afghan Wakhi to describe the location of the ground in a spatial array, and that an object-centered FoR is the preferred (but not the only) FoR used to describe the location of the figure.[10]

1.3.5 Phonetics

Descriptions of the phonetic system of Wakhi are relatively sparse. The phonetic descriptions that do exist are usually a minor part of a larger grammatical description (cf. Morgenstierne 1938; Lorimer 1958; Grünberg & Stéblin-Kamensky 1988a; Payne 1989; Bashir 2009; Hughes 2014); all of these descriptions are focused on the Pakistani and Tajik varieties. Unfortunately, the variety of transcription styles employed makes comparisons across descriptions and varieties difficult.

"The sound system of Gojal Wakhi" by Yoshie Satoko (2005) is currently the only published work focused solely on the phonetics and phonology of a variety of Wakhi. Satoko's

[10] A direct FoR is one in which an observer functions as the anchor (i.e., the starting point for the "vector . . . that narrows the search space (Danziger 2010: 168)) for a spatial description without projecting any body axes onto the scene. In an object-centered FoR, the anchor is the ground, which is distinct from the observer's body. Since the ground is the anchor, the axes of the projected coordinate system are determined by intrinsic features of the ground (O'Meara & Pérez Báez 2011: 839–840; Danziger 2010: 168).

description is primarily perceptual in nature. In addition to describing phonemes and giving examples of words in which they occur, she also briefly discusses topics such as consonant clusters, vowel elision, syllable structure, and stress.

The paper "A phonetic sketch of Afghan Wakhi" (SanGregory 2025c) uses both acoustic and perceptual data to provide an overview of the segmental phonetics of the Afghan variety of Wakhi. In addition to presenting the phonemic consonant and vowel inventories, the paper also describes several typologically interesting phenomena found in Afghan Wakhi, such as word-initial obstruent clusters, aspiration of voiceless obstruents in all environments, and an asymmetric distribution of vowel phonemes. Chapter 2 of this dissertation, which addresses the phonetics and phonology of Afghan Wakhi, is based on SanGregory (2025c).

1.4. History of Interaction

My first interaction with the Afghan Wakhi people took place during a one-week visit to the village of Kipkut in the central Wakhan Corridor in December 2012, which was followed by a two-month-long trip to the Wakhan in the spring of 2013. I began working in a language development program focused on Afghan Wakhi in late fall 2013 and spent four months living in the Wakhan and learning Afghan Wakhi during the winter of 2013-2014.

Between May 2014 – June 2021, I was based in Faizabad, the capital of Badakhshan Province. During this time, I visited the Wakhan Corridor six times for two to four weeks at a time. I interacted regularly with an Afghan Wakhi family living in Faizabad and took language lessons from the young mother in the family. The local staff working for the language development project called me approximately once a week, and we worked together intensively in person several times a year in the Wakhan (during my trips to the region) and in Faizabad (during their trips to the city to participate in professional development workshops). In addition

to these interactions, I occasionally had opportunity to spend time with Afghan Wakhi college students, professionals, and families living in Faizabad and Kabul. Thanks to all of these activities, I eventually reached a high intermediate (FSI 2+) level of language proficiency in Afghan Wakhi.

I relocated back to the U.S. in July 2021 and have since stayed in touch with Afghan Wakhi friends and acquaintances primarily via voice and text messages. After a four-year hiatus, I returned to the Wakhan for three weeks in the summer of 2023. The following summer, I spent two months in Kabul and brought each of the three former language development staff there to work with me.

My linguistic data collection and research activities have taken place at different times across my years of involvement with the Afghan Wakhi community. During the winter of 2014, I began collecting traditional proverbs. Thanks to the help of the local staff, we currently have a written collection of over 450 proverbs with brief explanations, all of which have been translated into Dari. We also have a smaller collection of riddles.

My initial corpus-collection efforts took place in 2015. In late winter, I recorded several short (3–5 minute) personal narratives and one 35-minute folktale with an Afghan Wakhi student living in Kabul. Of these, the folktale and one personal narrative have been transcribed and interlinearized. In the summer of the same year, I made an additional hour of recordings during a trip to the Wakhan. The speakers for this corpus were two young men, one from the central dialect region and one from the lower dialect region.

The majority of my corpus was recorded during my three-week trip to the Wakhan in 2023. Although all of the 50+ speakers who participated lived in 6 villages in the Central Wakhan at the time of recording, they represented 17 different villages of origin spread across

the length of the Wakhan Corridor. An additional half hour of recordings was made in Kabul in 2024 with one of the former staff members while he was in the city working with me. Section 1.5 of this dissertation gives a more detailed description of my research corpus, including composition, collection, and processing methods.

Linguistic research has been only one part of my work among the Afghan Wakhi. A large portion of my effort has been devoted to language development and mother-tongue literacy efforts as part of a community development program. Several different community members have been involved as full-time staff at different periods in the lifecycle of the program. The three most recent members, who are also the three with the longest tenure, are Boi Mohammad Faqiri, Juma Gul Payman, and Faiz Ali Ulfat. Both Boi Mohammad and Juma Gul joined the project in the winter of 2017. I first hired Faiz Ali in summer 2017 on a part-time basis while he attended college in Faizabad, and we added him to the full-time staff after he graduated in the fall of 2019. All three men have degrees from two-year teacher colleges and worked primarily as onsite literacy trainers and coordinators who oversaw the regular operations of the mother-tongue literacy program (teacher training and monitoring, reporting, networking with communities and regional government authorities, producing curricula and literature, etc.). They have been actively engaged in language advocacy on behalf of their people and worked closely with me on testing and revising the Afghan Wakhi orthography. Furthermore, they have supported my linguistic research by providing invaluable cultural and linguistic insights as well as connections to communities and individuals.

1.5. Research Corpus and Methods

The primary data for this dissertation is a corpus of approximately 7 hours of naturalistic oral texts. These texts were recorded with native speakers of Afghan Wakhi between 2015–2024.

Approximately 1 hour of the corpus comprises 6 dialogues and 18 narratives recorded for the research reported in my MA thesis (SanGregory 2018). The dialogues were semi-spontaneous roleplays; each was recorded without rehearsing after a brief discussion to determine the topic and the roles to be assumed by the participants (two young men). The narratives were elicited using two types of visual stimuli: picture strip stories (Takahashi & Frauman-Prickel 2015) and picture flashcards (Sardinha 2011). These 24 texts plus a spontaneously narrated folktale about 30 minutes in length (recorded in 2016) have been transcribed in IPA and interlinearized using Fieldworks Language Explorer (FLEx) (2025a).[11] The process used to transcribe and interlinearize this portion of the corpus is described in SanGregory (2018: 25–26).

An additional 5.5 hours of naturalistic texts were recorded during fieldwork conducted in the Wakhan Corridor and Kabul in 2023 and 2024, respectively.[12] Both men and women between the ages of 18–80 participated in making recordings. Genres of texts recorded include personal narratives, humorous stories, folktales, expositions (including cultural, historical, and religious topics), procedurals, and songs. This portion of the corpus is being processed using the workflow described by Pennington (2014), with the help of Boi Mohammad Faqiri, Juma Gul Payman, and Faiz Ali Ulfat, who have been working with me as research assistants. The research assistants use SayMore (2025b) to segment the recordings,[13] transcribe them using the Afghan

[11] FLEx is a linguistic software program that can be used to build a lexicon, interlinearize texts, do morphological analysis, analyze discourse structure, tag semantic categories, track anthropological notes, and more.

[12] This fieldwork was sponsored by Pike Small Grants 2023-001 and 2025-004 as well as a Firebird Research Grant received in 2024 from the Firebird Foundation for Anthropological Research.

[13] SayMore is a linguistics software program used to import, segment, transcribe, and translate audio recordings, It produces time-aligned *.eaf files with a single tier that can be further annotated in ELAN. Its simple interface and limited set of commands are designed for ease of use by non-native speakers of English and people with limited computer experience.

Wakhi orthography, and translate them into Dari using the Persian orthography.[14] They then send the resulting *.eaf files to me for continued processing.[15] I use FLEx to supply phonemic transcriptions and to produce interlinearized versions of the texts, including English free translations and parsing and glossing at the morpheme level.[16] When I finish interlinearizing each text, I use the EUDICO Linguistic Annotator software (ELAN) (2024) to time-align these annotations with the corresponding audio recordings. Examples in this dissertation that come from the corpus of naturalistic texts are cited by text name and sentence number (e.g., "(Wolf Attack 15)"). Some texts have a numeric name, in which case the sentence number follows a period. For example, "(TEX-0003.005)" refers to sentence 5 from text TEX-0003. Any example that does not have a citation was obtained via elicitation.

Although we had opportunities to work together in person in the summers of 2023 and 2024, the research assistants and I primarily worked together remotely and asynchronously as necessitated by the time difference between Afghanistan and Oregon. Since we were unable to talk in real-time on a regular basis, we sent each other many texts and voice messages. The messages that I received from the Afghan Wakhi researchers turned out to be an unexpected but invaluable source of primary data. In many ways, these messages, particularly the voice messages, are more similar to dialogic speech than monologic speech. For example, they tend to be more spontaneous and less planned than the monologic speech typically recorded for research purposes. As part of a conversation—albeit an asynchronous one—they both pose and answer questions in a manner not found in monologic speech; they also use natural, colloquial

[14] Both Afghan Wakhi and Dari are written with Arabic-based scripts. For a description and example of the Afghan Wakhi orthography in use, see §2.4.1.

[15] The *.eaf extension is used for the XML annotation files produced by both ELAN and SayMore.

[16] See §2.4.2 for a description of the technical orthography used for linguistic analysis.

vocabulary and constructions. Furthermore, their very medium (audio recordings and / or writing) provides a permanence that makes it possible to revisit and analyze them in a way that is not usually possible for natural, spontaneous conversation. I have used some of these messages to supplement my research corpus. The audio quality, although not up to par for acoustic phonetic analysis, is more than sufficient for grammatical analysis.

To study the morphosyntactic topics that fall within the scope of this dissertation, I began by identifying and examining relevant examples from the corpus. As further questions arose, I designed elicitation materials to obtain the types of data needed. I then used those materials to conduct virtual elicitation sessions with the research assistants. These elicitation sessions took the form of voice calls conducted via WhatsApp Messenger (2026) with the phone set on speaker.[17] I used Audacity® (Audacity Team 2025) to record the voice calls to my computer.[18]

1.6. Terminology and Approach

In my research and descriptions of the various types of predicates and argument structures in Afghan Wakhi, I necessarily rely on certain theoretical assumptions and associated terms. I therefore orient readers to my theoretical approach and key terminology in the following subsections. I introduce the concept of semantic roles and the inventory of semantic roles used in this dissertation in §1.6.1. In §1.6.2, I briefly describe grammatical relations and provide criteria for recognizing them in Afghan Wakhi. Finally, I define arguments and explain the conventions I use to diagram argument structure in §1.6.3.

[17] WhatsApp Messenger is a free communications app for mobile phones and computers that provides encrypted text and voice messaging functions.

[18] Audacity® is a free, open-source software program for recording and editing audio files.

1.6.1 Semantic Roles

Prototypical predicates require one or more participants. These participants take different SEMANTIC ROLES within the clause depending on the properties and relationships inherent to the situation described by the predicate. Semantic roles are distinct from grammatical relations (cf. §1.6.2), and different languages have different language-internal patterns and restrictions on how different semantic roles are grammatically expressed (Velupillai 2012: 230–231; Kroeger 2005: 53–54).

In this dissertation, I use 13 different semantic roles to categorize the participants required by a verb. I draw primarily from the inventories and definitions of semantic roles given by Velupillai (2012) and Kroeger (2005) to formulate the set of semantic roles relevant for my current research. Typographically, I capitalize the first letter of a semantic role (e.g., Recipient) to distinguish a technical term from a regular lexical word.

The first semantic role that I use is AGENT. An Agent (agt) is the entity that performs or initiates an event or action; it may be either sentient or non-sentient (e.g., a natural force). A prototypical (sentient) Agent typically has a high amount of control over the situation, as well as some degree of volition (Kroeger 2005: 54; Velupillai 2012: 231). In contrast, an EXPERIENCER (exp) is "an animate entity which perceives a stimulus or registers a particular mental or emotional process or state" (Kroeger 2005: 54) and that "does not have control of the . . .stimulus that it receives" (Velupillai 2012: 231).

A CAUSER (csr) is a new Agent argument that is introduced as part of a morphological or syntactic causative construction; it is the entity responsible for initiating the causing situation. In contrast, a CAUSEE (cse) is the entity in such a construction that is "caused to do something" or that "undergoes a change of condition or state" (Payne 1997: 176; Kroeger 2005: 277; Velupillai

2012: 260; Song 2013). Unlike a Patient, a Causee retains a degree of volition and / or control in the situation (Shibatani & Pardeshi 2002: 89).

A RECIPIENT (rec) is an entity that receives something from another participant (Velupillai 2012: 231); I also use "Recipient" for the addressee of a speech act. An entity that is acted upon or created by an Agent is a PATIENT. A Patient (pat) is affected by the action, over which it has little to no control (Velupillai 2012: 232; Kroeger 2005: 54). Unlike a Patient, a THEME (th) is unaffected by the action of the Agent. Instead, a Theme is a nonvolitional entity that merely changes location or possession, or for which the location is specified (Kroeger 2005: 54; Velupillai 2012: 232).

An entity that accompanies someone or something (typically the Agent) is a COMITATIVE (com) (Velupillai 2012: 232). STIMULUS (stim) is the semantic role assigned to the "object of perception, cognition, or emotion" that is perceived by an Experiencer (Kroeger 2005: 54) or, on occasion, by an Agent. For example, in (1), the entity *wuz* '1SG.NOM' forgives an offense *ɐw* '3SG.DIST'. I analyze this clause as having an Agent and a Stimulus because the act of forgiving is inherently volitional.

(1) ***wuz*** ***ɐw*** *tɐr* *bɐxʃiʃ=əm.*
1SG.NOM 3SG.DIST 2SG.DAT forgiveness=1SG
'I will forgive it for you.' (25.586)

In this dissertation, I find it necessary to distinguish between three types of locative semantic roles: Location, Goal, and Source. A LOCATION (loc) is "the entity expressing the point in space for an event or entity" (Velupillai 2012: 232). By this definition, a Location is a participant in an inherently stative situation, whereas Goals and Sources both entail a change of location and are therefore participants in eventive situations. A GOAL (gl) is a more specific sub-type of location that expresses "the destination or end-point of a motion" (Kroeger 2005: 54); it

is also the point of contact for eventive surface contact predicates, such as “hit” or “load” (Fillmore 1970: 125–130; DeLancey 2003: 56–58). Essentially the opposite of a Goal is a SOURCE (src), which most prototypically is the origin of a motion (Velupillai 2012: 232); however, a Source may also be the metaphorical origin of a non-motion event. For example, in (2), the item being used (keyboard software) is encoded via the Ablative PP *t͡sʊ kimɐn=ən=əʂ* ‘from Keyman’ as a Source from which the Agent obtains usefulness.

(2) *sɐk filɐn* ***t͡sʊ kimɐn=ən=əʂ*** *jɐrk dərz-ən;*
1PL.NOM currently from Keyman=ABL=IPFV work take-1PL

t͡sʊ kimɐn=ən=əʂ *istifɔdɐ t͡sɐr-ən*
from Keyman=ABL=IPFV usage do-1PL
‘'We are currently using Keyman [keyboard software]; we use Keyman.’
(lit., ‘We currently work take from Keyman; we do usage from Keyman.’)
(p.c. 01/27/2025)

Finally, I follow Bybee et al. (1994: 55) in using SITUATION (sit) as a generic term to refer to “the action or state described by the lexical predicate” of a clause. However, in argument structures (cf. §1.6.3), I use “Situation” (capitalized) as the semantic role that represents a clausal constituent.

1.6.2 Grammatical Relations

In contrast to semantic roles, which are used to identify semantic types of participants in a given situation, GRAMMATICAL RELATIONS are “the purely syntactic relations contracted between a noun phrase and its predicate” (Comrie 1989: 65). That is, a grammatical relation is the syntactic function that an NP performs in a particular clause, which must be identified on a language-specific basis by the coding and behavior properties of the NP (Velupillai 2012: 235). Different approaches to grammatical relations can be found throughout the literature. For

example, as Haspelmath (2011) describes,[19] the SAPTR system alone is applied differently by a number of linguists: some use it to compare alignment patterns cross-linguistically, while others use it as a descriptive tool.

I personally use the SAPTR terms to study alignment typologically and thus do not find them appropriate for labeling language-specific grammatical relations. Instead, I use the terms SUBJECT, DIRECT OBJECT, INDIRECT OBJECT, and OBLIQUE (Velupillai 2012: 236–237; Kroeger 2005: 55–60). As syntactic functions, these grammatical relations must be defined based on language-specific criteria such as behavior and coding properties (Croft 2001: 148–149).

The primary criteria that I use to identify grammatical relations in Afghan Wakhi are case marking (or suppletive case form), constituent order in basic (i.e., pragmatically neutral) clauses, and morphological participant indexation. Some grammatical relations have several options for case marking, depending on whether the noun phrase (NP) is headed by a noun or a pronoun. For a thorough description of case marking in Afghan Wakhi, see §3.1.3.

In Afghan Wakhi, a subject (SUBJ) consisting of a nominal NP or third-person pronoun is in the Default (unmarked) case. First- and second-person pronominal subjects typically occur in their Nominative case form, although 1SG and 2SG subjects may optionally appear in their suppletive Default case form.[20] Syntactically, a subject NP is initial in basic clauses. A subject is obligatorily indexed via a verbal suffix in the nonpast (3) (cf. §4.3.1); in a clause with another verb stem form or a nonverbal predicate, an optional subject-indexing enclitic performs this function (4) (cf. §3.5).

[19] See Haspelmath (2011: 539) for a particularly useful chart comparing three different approaches to the use of SAPTR terms. The SAPTR terms are defined as follows: S = single argument of an intransitive clause; A = agent-like argument of a transitive or ditransitive clause; P = patient-like argument of a transitive clause; T = theme-like argument of a ditransitive clause; R = recipient-like argument of a ditransitive clause.

[20] The use of the default case form for 1SG and 2SG subjects is a type of differential subject marking (DSM). For more information about DSM in Afghan Wakhi, see §3.1.3.10 and SanGregory (2018).

(3) NP_{SUBJ}
sɐk *ʃɔjɐd* *mʊri-**ən*** *bu* *sɐbɔ* *pɐs.*
1PL.NOM maybe die-1PL two day after
'Maybe we will die in two days (lit., 'two days after'). (02.03)

(4) NP_{SUBJ}
xɐj *wuz=**əm*** *rəwɟ-d.*
INTJ 1SG.NOM=1SG go-PST
'Well, I'm leaving.' (lit., 'I left.') (02.64)

Like subjects, direct objects (DO) in Afghan Wakhi exhibit several case marking options: they can occur in either their Default or Accusative case form.[21] In basic clauses, a direct object NP follows the subject and precedes the predicate, and it is never indexed on the verb or via the subject-indexing enclitics. Example (5) contains a Default direct object (*ɐw* '3SG.DIST') and an Accusative-marked direct object (*ɐ=ʒɐrʒ=i* 'the milk'), both of which precede their respective past-tense predicates. The same morphosyntax is found in nonpast clauses, such as (6), which includes an Accusative-marked pronominal direct object (*mɐzᵱ=i* '1SG=ACC') that precedes the predicate of the clause (the light verb construction *zɐr t͡sɐr-t* 'injured do-3SG').

(5) NP_{SUBJ} NP_{DO} NP_{DO}
wuz=əm ***ɐw*** *ðəwɟ-ni* *ʊt* ***ɐ=ʒɐrʒ=i*** *jut-i* *tɐ* *xun.*
1SG.NOM=1SG 3SG.DIST milk-PST and EMPH=milk=ACC carry-PST up.to house
'I milked them and carried the milk up to the house.' (03.21)

(6) NP_{SUBJ} NP_{DO}
ɐw ***mɐzᵱ=i*** *zɐr* *t͡sɐr-t.*
3SG.DIST 1SG=ACC injured do-3SG
'He will injure me.' (25.078)

There is one exception to the properties I have just described for direct objects: namely, direct object complement clauses, which I abbreviate as CC_{DO}. A complement clause is an externally defined unit that functions as a type of NP (cf. §3.2.1.2) that serves as an argument in

[21] The use of different case forms for direct objects is a type of differential object marking (DOM), which is discussed in §3.1.3.10.

a clause.[22] A non-finite complement clause occurs in the same syntactic position as an NP with the same grammatical relation, as seen for the CC_{DO} in (7). However, in this dissertation, I am primarily concerned with finite complement clauses. In Afghan Wakhi, finite complement clauses are commonly used to encode the complement of a PCU (perception, cognition, or utterance) predicate (e.g., *X* and *Y* in "I thought X"; "He told me Y"). Finite complement clauses of PCU predicates are almost always introduced by the generic complementizer *ki* 'COMP', and they always occur following the matrix PCU verb (8). The special grammar associated with a finite CC_{DO} in Afghan Wakhi is consistent with the cross-linguistical tendency for languages to extrapose finite complements, i.e., to restrict them to sentence-final position (cf. Noonan 2007: 93–95).

(7) NP_{SUBJ} CC_{DO}
[*wuz*] [*ti tɐt=ər çən-ɐk*] *nʊ=bɐs wəzi-əm.*
1SG.NOM 2SG.GEN father=DAT say-INF NEG=enough come-1SG
'I cannot tell your father.' (lit., 'I to your father to tell do not enough come.')[23] (04.24)

(8) NP_{SUBJ} NP_{IO}
[*mɐlim*] [*mɐr*] *ʃʊkɔjɐt kər-ti*
teacher 1SG.DAT complaint do-PST

CC_{DO}
[*ki: ti pʊtr=əʂ dɐrs nʊ=d͡ʒɔj-d*].
COMP 2SG.GEN son=IPFV lesson NEG=read-3SG
'The teacher complained to me that, "Your son doesn't study."' (01.01)

An Afghan Wakhi indirect object (IO) always takes Dative case marking, regardless of whether it is a nominal NP or a pronoun. The indirect object precedes the predicate in basic clauses, although its order relative to the direct object varies. For example, I examined a sample

[22] See §1.6.3 for my definition of "argument."

[23] The construction *bɐs wəzɐjən* literally translates as 'enough come', but it functions as a light verb construction meaning 'to be able'. See Chapter 6 for a detailed description of light verb constructions in Afghan Wakhi.

of 20 basic clauses with *rədɔwən* ‘to give’ and 12 basic clauses with *çənɐk* ‘to say, to tell’. All of the sample clauses exhibited basic constituent order (cf. §4.1.1) in that (a) both the DO and IO constituents were expressed (i.e., not elided), and (b) no constituents were preposed or postposed. Clauses containing either verb can use DO IO (examples (9) and (10)) or IO DO (examples (11) and (12)) constituent orders.

(9) NP_{SUBJ} NP_{DO} NP_{IO}
[*wuz*] [*tɐw*] *tɐnɔ* [*ji ʒpɨn=ər*] *rɐnd-əm.*
1SG.NOM 2SG alone one shepherd=DAT give-1SG
‘I will give you to a shepherd alone.’ (03.57)

(10) NP_{SUBJ} NP_{DO} NP_{IO}
∅ [*diwɔnɐ nɐʒmɔn ʒindɐ*] [*sɐv=ər*] *çɐn-əm.*
∅ crazy Nazhmaan folktale 2PL=DAT say-1SG
‘I will tell you the folktale of Crazy Nazhmaan.’ (TEX-0014-1.09)

(11) NP_{SUBJ} NP_{IO} NP_{DO}
xɐj, [*wuz*] *ɐn* [*tɐr*] [*ʐɐw*] *rɐnd-əm.*
INTJ 1SG.NOM then 2SG.DAT grain give-1SG
‘Well, then I will give you [some] grain.‘ (05.16)

(12) NP_{SUBJ} NP_{IO} NP_{DO}
xɐjr [*wuz*] [*sɐv=ərʊk*] [*çɨ nung=ĩ*] *çɐn-əm.*
INTJ 1SG.NOM 2PL.OBL=DAT self.GEN name=ACC say-1SG
‘Well, I will tell you my name.’ (TEX-0014-1.01)

As Table 1.1 shows, the DO IO order is nearly twice as common as the IO DO order in clauses where *rədɔwən* is the predicate, while the opposite is true for clauses in which *çənɐk* is the predicate. Thus, it would be inaccurate to say that either order is more basic, since the preferred relative ordering of direct and indirect objects appears to be (at least somewhat) verb-dependent.

Table 1.1. Relative order of direct and indirect object for two verbs

	DO IO	**IO DO**
rədɔwən 'to give'	13	7
çənɐk 'to say, to tell'	4	8

In ditransitive clauses, Afghan Wakhi nearly always uses direct and indirect objects as the non-subject grammatical relations (cf. (9) – (12)). In some of the typological literature on alignment, this type of system is referred to as INDIRECTIVE because the indirect object (R) of a ditransitive clause is the one that receives special marking, as opposed to the direct object (P) of a transitive clause and the T (theme-like argument) of a ditransitive clause, which receive identical marking (Haspelmath 2005: 1–2; Haspelmath 2011: 540). However, a few examples in my corpus exhibit a double-object construction instead. A DOUBLE-OBJECT construction is one in which the T and R of a ditransitive clause both receive the same marking as the P of a transitive clause (Haspelmath 2005: 1; Haspelmath 2013; Malchukov 2015: 84). In other words, a double-object construction exhibits NEUTRAL alignment of objects because P, T, and R are all treated identically (Haspelmath 2011: 541; Haspelmath 2015: 22).

In Afghan Wakhi double-object constructions, both objects are marked identically to the direct object of a transitive clause (either Default or Accusative case). As is the case for direct objects of transitive verbs, neither T nor R is indexed on the verb. Given the paucity of the data (only two examples of double-object constructions in my current corpus), it is currently impossible to determine whether constituent order differentiates T or R as more P-like. Therefore, I refer to both T and R simply as objects (OBJ). To distinguish them from each other, I

prefix T or R to the abbreviation OBJ; i.e., T-OBJ indicates the Theme-object, and R-OBJ indicates the Recipient-object. An example of a double-object construction is given in (13).

(13) NP_{SUBJ} $NP_{R\text{-}OBJ}$ $NP_{T\text{-}OBJ}$
[*jɐw*] [*mɐz̨*] [*ʊt sɨwdɔ*] *pɔr* *rɔt-i.*
3SG.DIST 1SG MED goods money give-PST
'He sold me those goods.'

In Afghan Wakhi, an oblique (OBL) almost always takes the form of a prepositional phrase (PP), as in (14).[24] Although there are a number of prepositions in Afghan Wakhi, the ones most commonly used to introduce oblique PPs as discussed in this dissertation are *skɐ* 'on', *də* 'LOC; COM', and *t͡sʊ* 'from'. The prepositions *skɐ* 'on' and *də* in its locative function both govern (i.e., require) a Default-case NP; *də* in its comitative function and *t͡sʊ* 'from' both govern an NP marked for Ablative case. Table 1.2 displays these prepositions and the case forms taken by their complements. Obliques typically occur between the subject and the predicate, but it is otherwise difficult to characterize their position with respect to direct or indirect objects. Unlike subjects, direct objects, and indirect objects, obliques are almost always syntactically (although not always semantically) optional.

(14) PP_{OBL}
niv *ʃɔjɐd* [*də* *mɐz̨=ən*] *dɐwɔ* *t͡sɐr-ən.*
now maybe COM 1SG=ABL quarrel do-1PL
'Now maybe they will quarrel with me.' (18.06)

[24] The Ablative case is nearly always governed by a preposition (cf. §3.1.3.8); in the rare cases when it is not, I still consider an Ablative-marked NP to be an oblique.

Table 1.2. Common prepositions used for obliques

Preposition	Object	Case
skɐ ‘on’	NP	Default
də ‘LOC’	NP	Default
də ‘COM’	NP=*ən*	Ablative
t͡sʊ ‘from’	NP=*ən*	Ablative

1.6.3 Arguments and Argument Structures

There is often a fair amount of confusion associated with the term ARGUMENT, which results from inconsistencies in how different linguists use it. For example, Kroeger (2005: 53–54) uses “argument” to refer to a semantic participant “of whom the property or relationship [expressed by the predicate] is claimed to be true.” In contrast, Velupillai (2012: 456) uses it to refer to an obligatory grammatical relation in a clause, while Payne (1997: 47) uses it more as a semantic-syntactic hybrid. I follow Kroeger in using a semantic definition of “argument;” i.e., I use it to refer to a participant that is notionally required by a predicate. For this reason, I refer to the arguments of a particular predicate by their semantic roles (see also Tesnière 2015: 97, 100–102, regarding “actants” (i.e., arguments)).

In a clause, the arguments of the predicate are mapped to grammatical relations. Even for the same predicate, the mapping of arguments to grammatical relations is not always the same—a speaker can use different grammatical relations to code the arguments in one clause vs. another depending on various factors, such as their perspective or pragmatic intent. I use argument structure diagrams to represent the mapping (or linking) of semantic roles (i.e., arguments) to grammatical relations. Consider sentence (15), which gives a ditransitive clause with its three arguments bracketed and labeled for their grammatical relations. Example (16) gives the argument structure for the verb *rədɔwən* ‘to give’ as it used in (15) and should be read as

follows: (a) the first line gives the arguments of the verb, named by their semantic roles; (b) the second line gives the grammatical relations used to code the arguments in the clause; and (c) the vertical lines linking the two represent the mapping of semantic roles to grammatical relations. In argument structure diagrams, I omit the phrase type for all grammatical relations except those instantiated by a complement clause.

(15) NP_{SUBJ} NP_{DO} NP_{IO}
[*ʃɐjəʃ*] [*ʊt͡ʃk*] [*mɐrʊk*] *mʊ=rɐnd-əv!*
2PL.NOM nothing 1SG.DAT PROH=give-2PL
'Don't you (PL) give me anything!' (03.61)

(16) <agt, th, rec>
| | |
SUBJ DO IO

As I mention in §1.6.2, obliques can be coded via several different kinds of prepositional phrases; the type of PP usually correlates to the semantic role of the argument. To shed light on the mapping patterns between semantic role and type of PP, I include the gloss of a preposition in an argument structure diagram; when the preposition takes an Ablative-marked object, I include that as well. The argument structure diagram (18) for the light verb construction *fɐrq t͡sərɐk* 'to differ' (lit., 'to difference do') as used in (17) includes these conventions.[25] I enclose the oblique PP in (18) in parentheses to indicate that it is not syntactically required. The Source argument (expressed as "src" within the angle brackets < >) that the oblique encodes is not similarly parenthesized because it is a semantic argument of the predicate, regardless of whether it is overtly expressed in a particular clause.

(17) NP_{SUBJ} PP_{OBL}
[*jəm mɔl*] [*t͡sʊ jɔmɐn=ən*] *fɐrq* *t͡sɐr-ən.*
PROX livestock from RECIP=ABL difference do-3PL
'These livestock differ from each other.'

[25] Light verb constructions, or LVCs, are the topic of Chapter 6.

(18) <th, src>
| |
SUBJ (OBL)
['from' + ABL]

In my descriptions, particularly those in Chapter 6 and Chapter 7, I frequently need to refer to a particular argument and the grammatical relation it maps to in an individual clause or construction. Writing out the entire relationship (e.g., "the Source argument that the oblique encodes," as in the preceding paragraph) is neither economical nor easy to process. Therefore, in text descriptions, I use the format "argument:RELATION", where the argument's semantic role fills the "argument" slot, and the abbreviated grammatical relation (sans syntactic phrasal category) fills the "RELATION" slot. For example, I could describe the predicate of (17) as having a theme:SUBJ and a source:OBL that is coded by a 'from' + ABL PP.

1.7. Typological Sketch

This dissertation is a focused examination of predicates and their arguments, not a detailed reference grammar of Afghan Wakhi. Therefore, in this section I provide a brief overview of select typological features to provide context and facilitate greater understanding of the data and examples given in the following chapters.

The basic constituent order in pragmatically neutral clauses is SOV, as shown in (19); for more detail, see §4.1.1. Example (19) also illustrates the indirective alignment pattern typical in Afghan Wakhi ditransitive clauses (cf. Haspelmath (2011: 540–541) and §1.6.2), although a few examples in my corpus do exhibit a double-object construction (cf. §1.6.2, §6.4.3.1, and §7.1.1). Like other Southeastern Iranian languages, Afghan Wakhi is primarily head-final: objects precede predicates, and adjective phrases precede the noun that they modify. In spite of this head-final tendency, the adpositional inventory comprises only prepositions, and relative clauses follow the head noun instead of preceding it. Non-finite complement clauses occur *in situ* (i.e., in

subject or direct object position), as seen in (20), but finite complement clauses always occur in post-verbal position (21).[26]

(19) NP_{SUBJ} NP_{IO} NP_{DO} V
ini niv [*wuz*] [*sɐv=ər*] [*ji ʒindɐ*] *çɐn-əm.*
DISC now 1SG.NOM 2PL=DAT one folktale say-1SG
'So now I will tell you a folktale.' (TEX-0014-1.07).

(20) NP_{SUBJ} CC_{DO}
xɐj [*wuz*] [*ti tɐt=ər çən-ɐk*] *nʊ=bɐs wəzi-əm.*
DISC 1SG.NOM 2SG.GEN father=DAT say-INF NEG=enough come-1SG
'Well I can't tell your father.' (lit., 'I don't come enough to tell your father.') (04.24)[27]

(21) NP_{SUBJ} NP_{IO}
[*wuz*]*=əm* [*jɐr*] *çɐt-i*
1SG.NOM=1SG 2SG.DAT say-PST

CC_{DO}
[*ki: xɐj, jɐw tʊj ti ʃɔgərd*].
COMP DISC 3SG.DIST COP 2SG.GEN student
'I said to him that, "Well, he's your student."' (01.13)

The noun phrase is a clear constituent in Afghan Wakhi, as I demonstrate in §3.1.1. The elements of non-finite complement clauses also form a tight constituent, as illustrated by (20), in which the subordinate clause (including the indirect object of the non-finite verb) maintains its own internal structure while functioning as the direct object of the main clause. However, the direct object and verb of a clause do not form a VP constituent, as evidenced by the fact that a sentential adverb (22) or a subject-indexing clitic (23) can come between them.[28]

[26] The position of finite complement clauses in Afghan Wakhi is consistent with a strong cross-linguistic tendency to restrict such clauses to sentence-final position (cf. Noonan 2007: 92–96).

[27] The collocation *bɐs wəzɐjən* (lit., 'to enough come') is a complement-taking light verb construction (LVC) meaning 'to be able' in Afghan Wakhi (cf. §6.5). For an in-depth description of LVCs in Afghan Wakhi, see Chapter 6.

[28] The Afghan Wakhi subject-indexing clitics can only attach to the end of a constituent (cf. §3.5; see also Hughes (2014: 121) and SanGregory (2025d: 124))

(22) NP_{SUBJ} NP_{DO} V
[*wuz*] [*zɐ=v=i*] ***bʊ*** *nʊ=vɐrɐnd-əm.*
1SG.NOM child=PL.OBL=ACC also NEG=abuse-1SG
'I don't abuse [i.e., bully] the children, either.' (01.35)

(23) *buj truj ɐ=dr=ɐ tu,*
two three EMPH=at=DIST COP.PST

NP_{SUBJ} $NP_{DO=SUBJ}$ V $NP_{DO=SUBJ}$ V
∅ [*jɐ=v*] ***=əm*** *ðəwʝ-ni ʊt ɐ=*[*ʒɐrʒ*] ***=əm*** *jut-i tɐ xun.*
∅ 3.DIST=PL.OBL=1SG milk-PST and EMPH=milk=1SG carry-PST up.to house
'Two or three were there; I milked them and carried the milk up to the house.' (03.05)

Although many other Iranian languages have only a two-term case system (cf. Skjærvø 1989: 371; Robson & Tegey 2009: 726; Edelman & Dodykhudoeva 2009: 781; Haig 2008: 131–132), Afghan Wakhi has a robust inventory of eight cases: Nominative, Default, Accusative, Dative, Genitive, Possessive, Ablative, and Vocative. For case marking, alignment is split between neutral and nominative-accusative patterns (cf. §3.1.3.10), but subject indexation follows only a nominative-accusative alignment pattern (cf. §3.5). Noun phrases may be marked for plural number (§3.1.2), but unlike some Pamir languages (cf. Edelman & Dodykhudoeva 2009: 780), Afghan Wakhi does not exhibit grammatical gender on referring expressions of any type. Adjective phrases do not agree with the head noun for either case or number. Subjects are frequently elided, and objects may also be elided when recoverable from context.

As in other Pamir languages (cf. Edelman & Dodykhudoeva 2009: 782), the verbs of Afghan Wakhi have three stems: nonpast, past, and perfect (cf. §4.2). These three stems may be further inflected to form four (primarily tense-distinguished) types of verb wordforms as well as several types of deverbal nouns and adjectives. In the nonpast, obligatory suffixes index the subject of the clause. A set of optional subject-indexing enclitics performs the same function

with past and perfect verb forms and in nonverbal predicate constructions (Obrtelová 2019: 60; SanGregory 2025d: 122–124).

1.8. Outline

This dissertation is structured as follows. Chapter 2 is a phonology sketch of Afghan Wakhi. I describe the segmental phonology of Afghan Wakhi and introduce two orthographic systems used to write Afghan Wakhi: the Arabic-based orthography used by the community, and the technical IPA orthography that I use throughout the dissertation.

The topic of Chapter 3 is referring expressions. There are two main types of referring expressions in Afghan Wakhi: noun phrases (NPs), which may be headed by nouns or pronouns, and subject-indexing clitics. In Chapter 3, I describe the internal composition and syntactic distribution of NPs, NP-level morphology (number, case, and specificity), characteristics of noun words, and types and properties of various pronominal forms. I also introduce the subject-indexing clitics and describe the alignment patterns found on referring expressions.

Chapters 4–6 each address a different predication strategy found in Afghan Wakhi. In Chapter 4, I focus on lexical verbs and verbal predication. I overview the structure of basic verbal clause types and discuss the features common to all lexical verbs. After introducing the three stem types (nonpast, past, and perfect) in the Afghan Wakhi verbal system, I describe the morphology and functions associated with each type of stem.

Chapter 5 shifts from lexical verbs to nonverbal predicates, beginning with the copular forms commonly found in nonverbal predicate constructions. I then compare several typologies of the functional types of nonverbal predicates. Building on this foundation, I describe the basic construction used with NP, AP, and locative predicates; the basic construction for existential clauses; and the basic construction for predicative possession. I then present several marked

nonverbal predicate constructions along with some hypotheses regarding their potential pragmatic functions.

Afghan Wakhi relies heavily on light verb constructions (LVCs) to express a wide variety of verbal and / or predicational meanings; these constructions are the topic of Chapter 6. I introduce LVCs in general and overview the properties characteristic of Afghan Wakhi LVCs. I then examine the types of preverbs that correlate with each of the five most frequent light verbs and the "clusters of productivity" (Family 2014: 4, 22) (i.e., semantic patterns) that emerge from these correlations. After briefly introducing other (less-productive) light verbs, I discuss light verb alternations, argument encoding patterns, and LVC innovations.

I describe the valency-changing constructions of Afghan Wakhi in Chapter 7. Valence-increasing strategies include a causative suffix and two periphrastic causative constructions. A single analytic passive construction decreases the valence of a lexical verb. Some LVCs use these same valence-increasing and decreasing strategies; however, many others undergo valence changes accomplished via light verb alternations. Some of these alterations are idiosyncratic, but others follow predictable patterns associated with certain clusters of productivity.

Chapter 8 concludes this dissertation. In this chapter, I summarize the key findings from Chapters 2–7 and point out several directions for future research.

CHAPTER 2

PHONOLOGY

As described in §1.3, previous work on Wakhi is largely composed of descriptions of topics related to grammar and discourse. Although some of these descriptions do address phonetics and phonology to varying degrees, Satoko (2005) is currently the only published work dedicated to the phonetics and phonology of a variety of Wakhi. In this chapter, I provide a sketch description of the segmental phonetics of Afghan Wakhi, presenting inventories of consonant and vowel phonemes in §2.1 and §2.2, respectively. I then discuss prosody-related topics (syllable structure and stress) in §2.3. I close the chapter by describing two orthographic conventions used to write Afghan Wakhi: the local Arabic-based orthography (§2.4.1) used for local literature and literacy materials, and the technical IPA-based orthography (§2.4.2) used throughout this dissertation and in documentary materials.

This description is based on recordings made by Boi Mohammad Faqiri, Juma Gul Payman, and Faiz Ali Ulfat. All three men are in their mid-late 20s and are native speakers of the "middle" dialect of Afghan Wakhi, i.e., the dialect spoken in the central region of the Wakhan Corridor.[29] All three men have completed 12 years of school plus a 2-year teacher training degree, and all three previously worked as literacy trainers and supervisors in a mother-tongue literacy program. Each was raised in a monolingual home environment and learned Dari at school; additional language exposure includes English, Shughni, and Darwazi. The recordings for all three men were primarily made with a Sennheiser ME3 headset microphone and a Zoom H5 digital recorder in a soundproofed recording studio in Kabul, Afghanistan. Supplementary

[29] Speakers of Afghan Wakhi recognize three mutually intelligible dialects: lower (spoken in the southwestern part of the Wakhan), middle / central (spoken in the central part of the Wakhan), and upper (spoken in the northeastern part of the Wakhan).

video of the primary elicitation sessions was recorded using a Sony a6400 camera. Some additional audio examples were recorded with a Shure WH20 headset microphone and the mobile app WaveEditor for Android™ (2025). Audio recordings of examples in this chapter are available on Zenodo at https://doi.org/10.5281/zenodo.17259579.

2.1. Consonants

Previous phonetic work is limited to the Pakistani variety of Wakhi, and varies in the number of consonants listed. Morgenstierne (1938: 443) and Lorimer (1958: 12) give nearly identical inventories of thirty-seven consonants, including the subphonemic nasals [ɳ, ŋ]; they differ only in that Morgenstierne includes a voiceless lateral approximant that Lorimer omits, while Lorimer includes subphonemic [h] instead. Grünberg & Stéblin-Kamensky give an inventory of thirty-five consonants; they include [h] as a phone but do not analyze it as phonemic (1988b: 10–11). Like Lorimer, Payne (1989: 425) includes [h] in his inventory, but he omits the coronals /n, t͡s, d͡z/ that were part of Morgenstierne's and Lorimer's inventories. The most recent descriptions of Pakistani Wakhi (Satoko 2005: 51; Bashir 2009: 827) both give inventories of thirty-six consonants, but each includes one pair of fricatives that the other excludes (postalveolar vs. uvular, respectively).

The Afghan Wakhi consonant inventory presented here comprises thirty-five phonemic consonants (see also SanGregory 2018: 4); these include the dental nasal and affricates but exclude the subphonemic retroflex and palatal nasals and the uvular fricatives.[30] It includes consonants at nine places of articulation, from bilabial to uvular. Stops, affricates, and fricatives exhibit a two-way contrast based on laryngeal settings (voiced vs. voiceless). Sonorants (nasals,

[30] I use the orthographic symbols /t/ and /d/ to represent dental stops for ease of transcription. I use /r/ to transcribe the alveolar flap (which may be realized as a trill in careful speech) for the same reason.

flaps, approximants, and the lateral approximant) do not have phonemic voicing contrasts. Afghan Wakhi has fourteen fricatives in its inventory, with fricatives at every place of articulation except bilabial and uvular. The voiceless glottal fricative [h] sometimes appears in loanwords and sometimes as an onset to vowel-initial words, but it does not affect meaning and therefore is not analyzed as a phoneme. The inventory of all thirty-five phonemic consonants is given in Table 2.1. Examples of consonant phonemes in contrastive / analogous environments can be seen in Table 2.2 (voicing distinctions) and Table 2.3 (place distinctions).

Table 2.1. Phonemic consonant inventory of Afghan Wakhi

	Bilabial	**Labiodental**	**Dental**	**Alveolar**	**Postalveolar**	**Retroflex**	**Palatal**	**Velar**	**Uvular**
Stop	p b		t d			ʈ ɖ		k g	q
Affricate				t͡s d͡z	t͡ʃ d͡ʒ	ʈ͡ʂ ɖ͡ʐ			
Nasal	m			n					
Flap				ɾ					
Fricative		f v	θ ð	s z	ʃ ʒ	ʂ ʐ	ç ʝ	x ɣ	
Approximant	w						j		
Lateral approximant				l					

Table 2.2. Consonant pairs by voicing in contrastive / analogous environments

Phoneme	Example	Gloss	Phoneme	Example	Gloss
/p/	/pʊ/	‘up to; with’	/l/	/lɐng/	‘lame’
/b/	/bʊ/	‘also’	/f/	/fɐnd/	‘lie, falsehood’
/t/	/ti/	‘2SG.GEN’	/v/	/vɐnd/	‘fasten (3SG)’
/d/	/di/	‘hit (2SG)’	/θ/	/θɨwd	‘burn (3SG)’
/ʈ/	/ʈung/	‘hard’	/ð/	/ðɨwd/	‘sharpen with rock (3SG)’
/ɖ/	/ɖum/	‘heap’	/s/	/sɐr/	‘head’
/k/	/kur/	‘blind’	/z/	/zɐr/	‘injured’
/g/	/gur/	‘grave’	/ʃ/	/ʃpɐk/	‘nurse (INF)’
/q/	/qɐr/	‘anger’	/ʒ/	/ʒʊpɐk/	‘to spin wool into yarn’
/t͡s/	/t͡sʊ/	‘from’	/ʂ/	/ʂɔr/	‘kind of firewood’
/d͡z/	/d͡zi/	‘way’	/ʐ/	/ʐɔr/	‘tattered’
/t͡ʃ/	/t͡ʃɐng/	‘claw’	/ç/	/çɐʂ/	‘mother-in-law’
/d͡ʒ/	/d͡ʒɐng/	‘war’	/ʝ/	/ʝɐʂ/	‘mouth’
/t͡ʂ/	/t͡ʂɐx/	‘cluck (2SG)’	/x/	/xɐm/	‘descend (2SG)’
/ɖ͡ʐ/	/d͡ʐɔɣ/	‘low (VSTEM)’	/ɣ/	/ɣɐm/	‘grief’
/m/	/mɨr/	‘apple’	/w/	/wul/	‘roll’
/n/	/nɨr/	‘divine light’	/j/	/jɐw/	‘eat (2SG)’
/r/	/rɐng/	‘color’			

Table 2.3. Consonant pairs by place of articulation in contrastive / analogous environments

Phoneme	Example	Gloss	Phoneme	Example	Gloss
/t/	/tɐt/	‘father’	/d/	/dur/	‘stomach’
/ʈ/	/ʈɐz/	‘bald’	/ɖ/	/ɖum/	‘drum’
/θ/	/θɐp/	‘graze (VSTEM)’	/ð/	/ðɐrt/	‘manure’
/s/	/sɐk/	‘1PL’	/z/	/zɐrt/	‘yellow’
/ʃ/	/ʃɐk/	‘bad’	/ʒ/	/ʒɐrʒ/	‘milk’
/ʂ/	/ʂɐç/	‘chickling vetch’	/ʐ/	/ʐɐng/	‘louse’
/ç/	/çɐk/	‘make (INF)’	/j/	/jɐr/	‘stone’
/t͡s/	/t͡sɐn/	‘from (DIST)’	/d͡z/	/dzuj/	‘yak’
/t͡ʃ/	/t͡ʃɐng/	‘claw’	/d͡ʒ/	/d͡ʒuj/	‘irrigation canal’
/t͡ʂ/	/t͡ʂɐx/	‘cluck (2SG)’	/ɖ͡ʐ/	/ɖ͡ʐʊq/	‘ajar’

2.1.1 Voicing and Aspiration

In Afghan Wakhi, voicing is contrastive for nearly all obstruents (stops, affricates, and fricatives); the voiceless uvular stop /q/ is the only obstruent without a voiced counterpart. Voiceless obstruents are characterized by positive VOT (aspiration), while voiced obstruents exhibit negative VOT (prevoicing). Overall, the stops of Afghan Wakhi exhibit the same correlation between place and VOT as that attested in the general literature on acoustic phonetics; i.e., the duration of both aspiration and prevoicing is greater for stops articulated farther back in the mouth than for those articulated closer to the front (Lisker & Abramson 1964; Cho & Ladefoged 1999). I used Praat (Boersma & Weenink 2022) to segment 81 tokens of stops, and I used a Praat script (Adisiswoyo 2022) to measure the VOT of those tokens. I calculated the means and standard deviations of these measurements in R (Posit team 2024). All 81 tokens occurred word-initially before a vowel. The mean and standard deviation values for VOT of word-initial stops can be seen in Table 2.4.

Table 2.4. Mean and standard deviations for VOT of initial stops in Afghan Wakhi

	Mean VOT (ms)	SD VOT (ms)
p	58.17	18.06
t	58.07	16.55
ʈ	76.73	27.67
k	128.82	33.26
q	99.01	11.23
b	-130.64	60.92
d	-107.53	26.15
ɖ	-147.14	80.93
g	-124.46	50.19

The waveforms and spectrograms given in Figure 2.1 illustrate the minimal pair /kur/ ‘blind’ vs. /gur/ ‘grave’, which are differentiated only by the VOT of their initial stops.

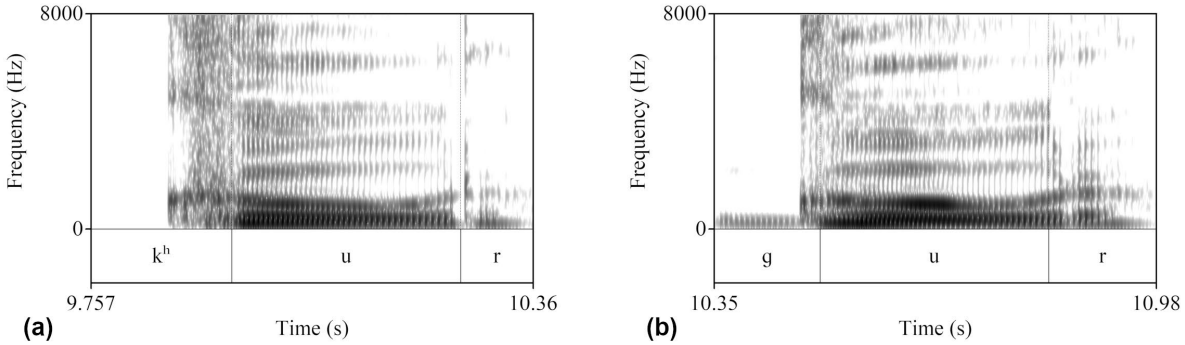


Figure 2.1. Spectrograms for /kur/ ‘blind’ (a) vs. /gur/ ‘grave’ (b)

Voiceless stops are not only aspirated in word-initial position; they are also aspirated when they follow a sibilant in an onset cluster. An example of an aspirated stop following a sibilant can be seen in the spectrogram for the word /ʂtik/ ‘playing’, which is displayed in Figure 2.2.

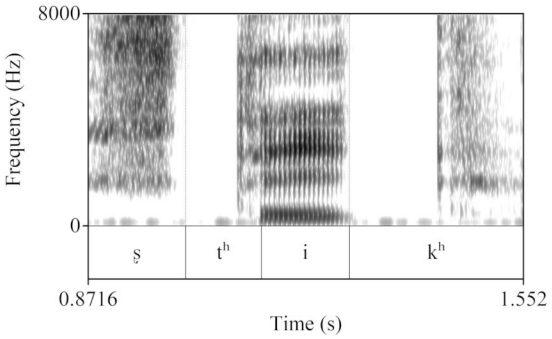


Figure 2.2. Aspiration of a voiceless stop following a sibilant

Voiceless stops are always aspirated as part of a word-initial stop+stop or affricate+stop cluster (SanGregory 2018: 6) regardless of whether they are the first or second consonant in the cluster. Examples of aspirated stops and affricates in word-initial clusters are given in Figure 2.3.

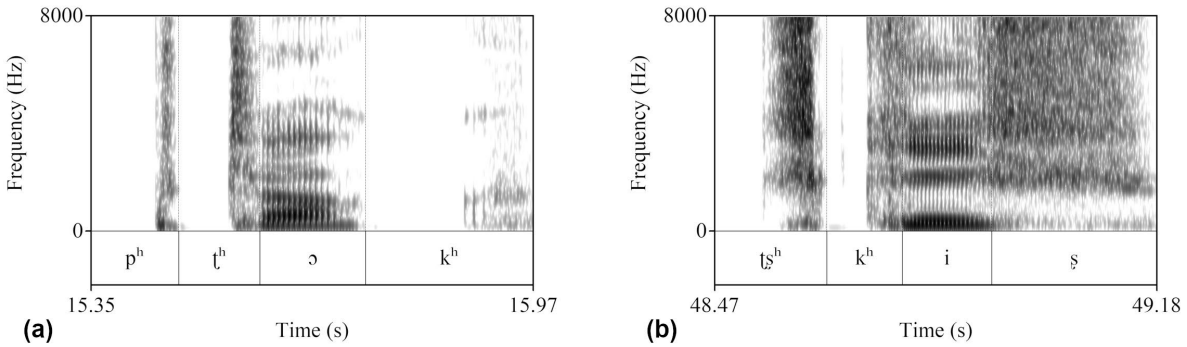


Figure 2.3. Aspiration of voiceless stops and affricates in onset clusters in the words /pʈɔk/ ‘biscuit’ (a) and /t͡ʂkiʂ/ ‘tandoor top’ (b)

Voiceless stops are aspirated intervocalically, although intervocalic stops are not aspirated as heavily as stops in other environments. For example, consider the intervocalic /t/ in the word /ʂkʊti/ ‘break (PST)’, which is displayed in Figure 2.4. The burst of release is clearly evident, but it is neither as long nor as intense as those seen in previous examples. Mild aspiration is also a characteristic of word-final voiceless stops, as seen in the spectrogram for the

word /qɔp/ ‘plate’, given in Figure 2.5. Additional examples of final aspiration can be seen in the spectrograms for /ʂtik/ ‘playing’ (Figure 2.2) and /pʈɔk/ ‘biscuit’ (Figure 2.3 (a)).

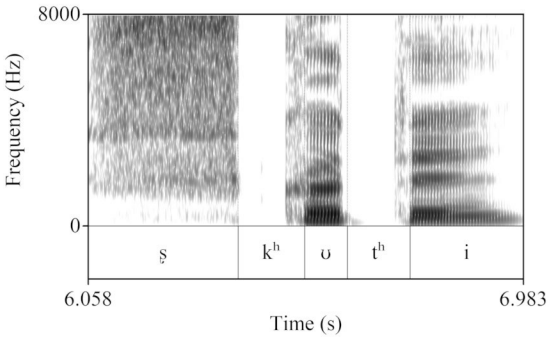


Figure 2.4. Aspiration of an intervocalic voiceless stop in the word /ʂkʊti/ ‘break (PST)’

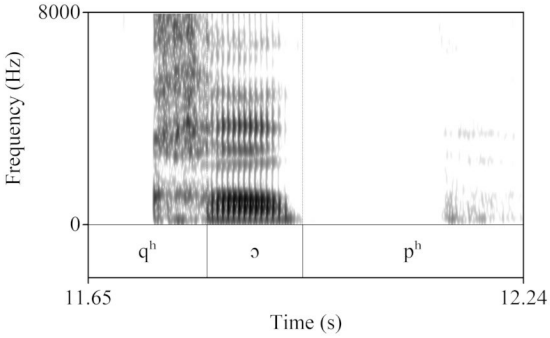


Figure 2.5. Aspiration of a word-final stop in the word /qɔp/ ‘plate’

Voiceless stops that serve as the initial consonant of a word-final coda cluster are aspirated, although the degree of aspiration varies based on the manner of the following consonant. When the following consonant is a sibilant, the duration and intensity of the aspiration are milder as compared to when the following consonant is a stop or affricate. Figure 2.6 displays spectrograms for the words /fuks/ ‘snake’ and /kɐpt͡ʃ/ ‘spoon’ that illustrate this difference.

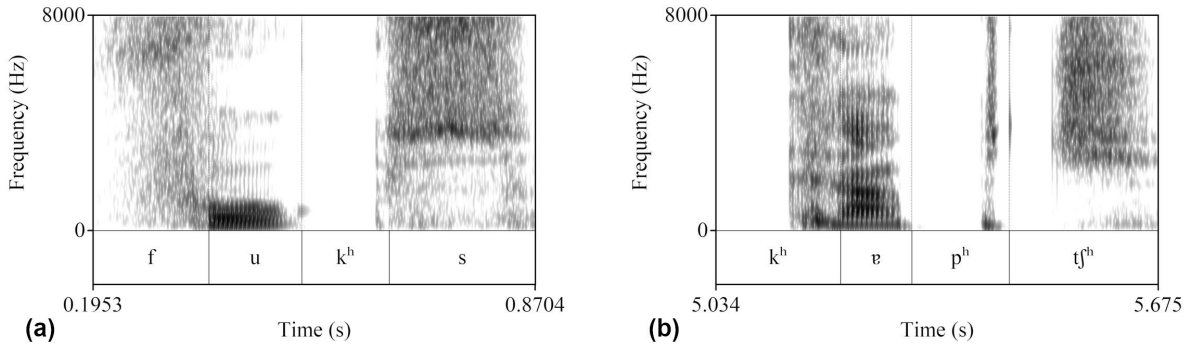


Figure 2.6. Aspiration of cluster-initial stops in codas in the words /fuks/ ‘snake’ (a) and /kɐpt͡ʃ/ ‘spoon’ (b)

From the examples presented in this section, it is clear that in Afghan Wakhi, voiceless stops are aspirated in all environments. Therefore, what is perceived as a voiced-voiceless contrast is acoustically a distinction between negative and positive VOT (or in the terminology of Lisker and Abramson (1964: 389), “voicing lead” and “voicing lag”). Since aspiration is not meaningful, i.e., does not contrast with a lack of aspiration for voiceless stops, I do not include aspiration in my phonemic transcriptions.

2.1.2 Liquid Devoicing

The rhotic flap /r/ and the lateral approximant /l/, which together comprise the natural class of liquids, are subject to a process of voicing assimilation (SanGregory 2018: 7). Both liquids are devoiced when they immediately precede another voiceless consonant. An example of liquid devoicing for /r/ can be seen in Figure 2.7 (a).

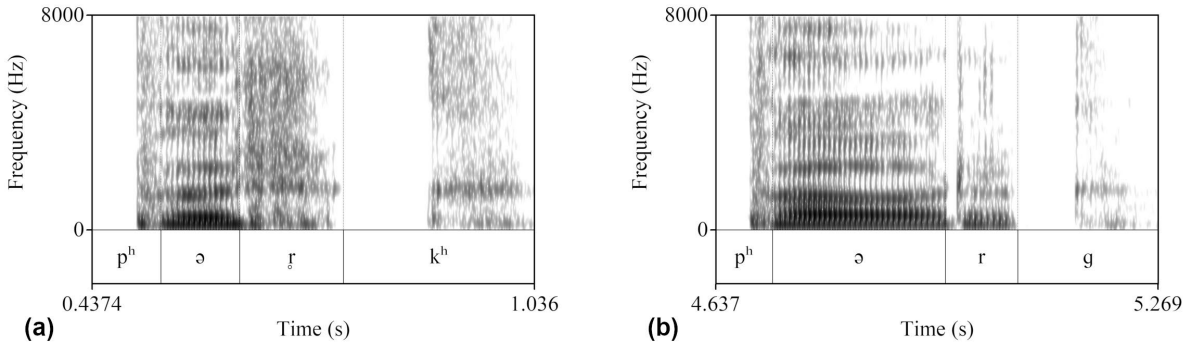


Figure 2.7. Devoicing of the liquid /r/ in the word /pərk/ ‘mouse’ (a) vs. /pərg/ ‘bead’ (b)

In Figure 2.7 (b), it is also evident that the final /g/ of /pərg/ is devoiced, as well as slightly released and aspirated. Word-final devoicing is a common process in Afghan Wakhi. However, speakers are able to distinguish word-final voiced consonants via two types of displaced contrast: liquid voicing and vowel length. As seen in Figure 2.7 (b), the /r/ that precedes the final /g/ in /pərg/ is voiced, not voiceless as is the one preceding the final /k/ in /pərk/. The voicing of the liquid signals that the final segment should be interpreted as belonging to the category of voiced obstruents even though, acoustically speaking, it is voiceless in this context. Similarly, vowels in syllables with voiced coda consonants or clusters are approximately 50% longer than vowels in syllables with voiceless coda consonants or clusters, even when the voiced coda (or final segment of a cluster) is acoustically devoiced, as in Figure 2.7 (b). These data were measured only for vowels in stressed syllables in order to avoid the confounding variable of length conditioned by stress. The means and standard deviations of vowel duration in syllables with voiced vs. voiceless codas are given in Table 2.5.

Table 2.5. Means and standard deviations of vowel duration by coda voicing (stressed syllables only)

Coda	Mean Vowel Duration (ms)	SD Vowel Duration (ms)
Voiced	31.26	4.20
Voiceless	20.44	6.39

2.1.3 Nasal Assimilation

Phonemically, Afghan Wakhi has two nasal consonants, /m/ and /n/. These two consonants contrast in word-initial, word-final, and intervocalic environments. A minimal pair illustrating the contrast between these two nasals in word-initial position is given in Figure 2.8.

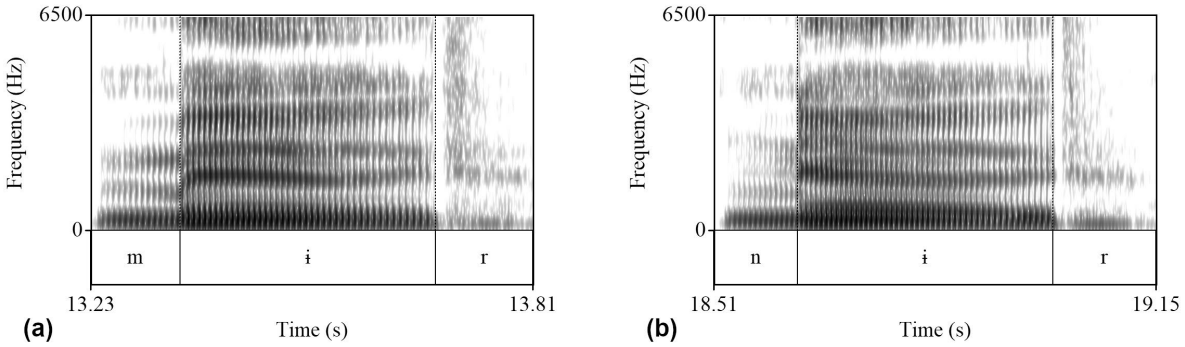


Figure 2.8. Spectrograms for the minimal pair /mɨr/ ‘apple’ (a) and /nɨr/ ‘divine light’ (b)

Nasal-stop sequences are always homorganic. Examples of homorganic nasals preceding retroflex and velar stops are seen in Figure 2.9 (a) and (b), respectively. Note that the place of articulation for the nasal in Figure 2.9 (b) is evident from the velar pinch exhibited by the formants of the preceding vowel.

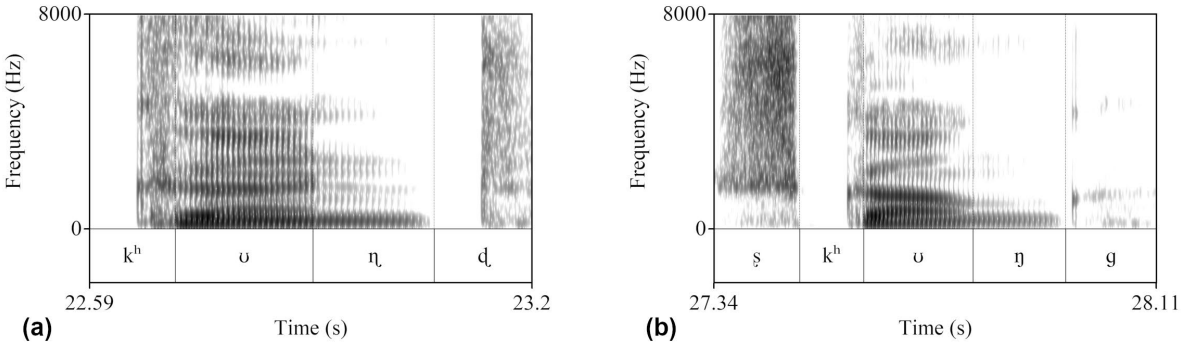


Figure 2.9. Nasal assimilation in the words /kʊnɖ/ 'dull' (a) and /ʂkʊng/ 'break (PRS)' (b)

2.2. Vowels

When it comes to the vowels of Wakhi, "there is undoubtedly much variation" (Lorimer 1958: 24), as the lack of consistency in the literature makes clear. As was the case for consonants, the existing descriptions of vowels are focused on the Pakistani variety of Wakhi. Among these descriptions, there seems to be a sharp time-based divide: the two earliest descriptions (Morgenstierne (1938) and Lorimer (1958)) give vowel inventories that include twice as many vowels as those found in later descriptions. These large inventories include length distinctions which Morgenstierne (1938: 448) says are contrastive. Although Lorimer (1958: 24) also includes long vowels in his inventory, he is less committed to their phonemic status. Historically, Old Iranian had contrastive vowel length (Comrie 1981; Skjærvø 1989), but length-based distinctions have disappeared in many modern Iranian languages (Comrie 1981; Payne 1989; Edelman & Dodykhudoeva 2009). The more recent descriptions (Grünberg & Stéblin-Kamensky (1988b), Payne (1989), Satoko (2005), and Bashir (2009)) include 6-7 vowels but vary in which vowels they include among those; nevertheless, all three agree that length is no longer contrastive. Thus, the differences between these two sets of vowel inventories may indicate that the loss of phonemic length was still in process until the latter half of the 20th century.

2.2.1 Pure Vowels

The only vowel inventory given for Afghan Wakhi in the literature is provided by Bashir (2009: 827). Her five-vowel inventory /i u ы ə o/ does not include a low vowel.[31] Unfortunately, Bashir provides no acoustic evidence or minimal pairs to support her analysis.

According to my analysis, Afghan Wakhi has seven phonemic vowels: /i ɨ u ʊ ə ɔ ɐ/. Figure 2.10 displays a chart of the vowel phonemes, followed by a list of words in Table 2.6 that illustrates the contrasts between vowel phonemes.

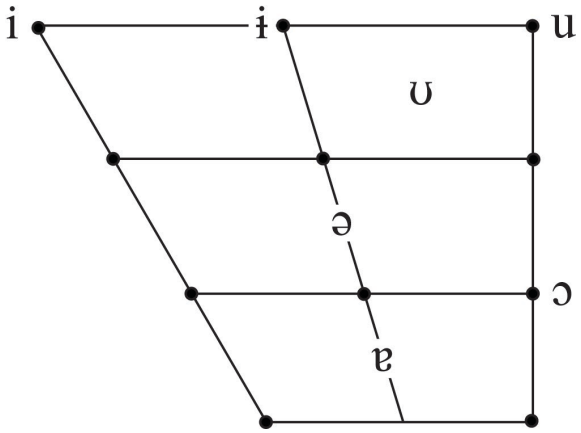


Figure 2.10. Phonemic vowel inventory of Afghan Wakhi

[31] Bashir (2009) uses the Cyrillic symbol *ы* to transcribe the sound represented by *ɨ* in the IPA.

Table 2.6. Vowel pairs in contrastive / analogous environments

Phoneme	Example	Gloss
/i/	/mir/	‘ruler, leader’
/u/	/mur/	‘cloud’
/ɨ/	/bɨt͡ʃ/	‘billy goat’
/ʊ/	/bʊt͡ʃ/	‘uncle’
/ə/	/vɐrɐndəm/	‘scold (1SG)’
/ɔ/	/ʂɔr/	‘kind of firewood’
/ɐ/	/ʂɐr/	‘city’
/ʊ/	/bʊn/	‘bottom’
/u/	/bun/	‘pitchfork’
/ɨ/	/pɨd/	‘foot’
/u/	/pup/	‘grandfather’
/ə/	/pərk/	‘mouse’
/ɐ/	/pɐrg/	‘ash’

The acoustic vowel space is displayed in Figure 2.11. I used Praat (Boersma & Weenink 2022) to measure the first and second formants of 234 vowel tokens with a Praat script (Kallay 2018); I then plotted the results with R (Posit team 2024). All of the vowel tokens measured were monophthongs between consonants. Except for schwa, all vowels were also stressed; all tokens of schwa were non-reduced.

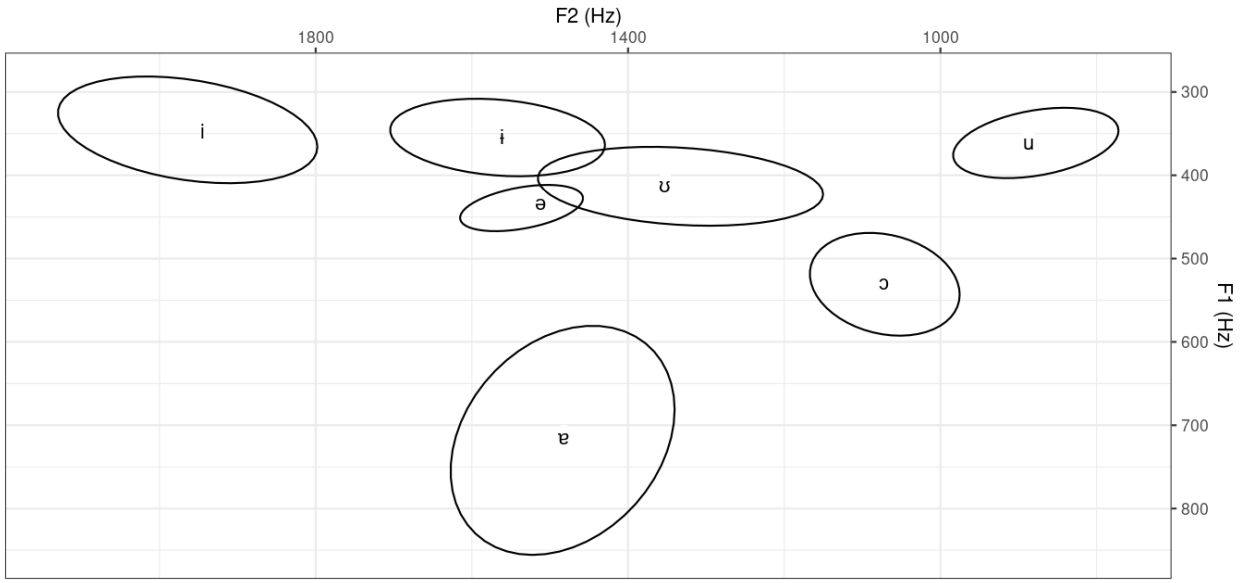


Figure 2.11. Mean F1 and F2 values of vowel phonemes with 75% confidence ellipses

Table 2.7 displays the mean formant frequences for each vowel, rounded to the nearest whole number, as well as the standard deviations for F1 and F2.

Table 2.7. Means and standard deviations of formant frequencies for vowel phonemes

	F1		F2	
	Mean	**SD**	**Mean**	**SD**
i	347	45	1945	221
ɨ	353	30	1561	98
u	360	30	887	76
ə	433	33	1512	130
ʊ	412	33	1353	141
ɔ	528	43	1072	72
ɐ	714	94	1482	100

2.2.2 Off-glided Vowels

Afghan Wakhi has an inventory of ten phonemic off-glided vowels. Of these nine, six are rising-fronting off-glides formed with /j/, and the remaining four are rising-backing off-glides formed with /w/. I analyze these sequences as off-glided vowels rather than diphthongs because they pattern with consonants in the types of morphophonemic processes they condition. For

example, verb stems ending in an off-glided vowel take the same allomorph of the 3SG subject-indexing suffix that is used following voiced consonants: compare *pʃɨw-d* 'vomit-3SG' and *d͡ʒɔj-d* 'read-3SG' to *wʊzʊm-d* 'bring-3SG'. In contrast, when following vowels or voiceless consonants, the same suffix is realized as *-t*, as seen in *wizi-t* 'come-3SG' and *dʊʃ-t* 'hit-3SG'. The ten off-glided vowels of Afghan Wakhi, along with illustrative examples, are displayed in Table 2.8.

Table 2.8. Phonemic off-glided vowel inventory of Afghan Wakhi

Off-glide	**Example**	**Gloss**
/ɐj/	/ðɐj/	'husband'
/ɨj/	/çɨj/	'sister'
/ɯj/	/bɯj/	'two'
/ʊj/	/tʊj/	'copula (NPST)'
/əj/	/dəjçt/	'hit (PST)'
/ɔj/	/t͡ʃɔj/	'tea'
/ɐw/	/jɐw/	'distal demonstrative'
/iw/	/diw/	'ogre'
/ɨw/	/ʂɨw/	'black'
/əw/	/ʂəw/	'horn'

2.2.3 Vowel Reduction

According to Grünberg & Stéblin-Kamensky (1988b: 6), vowels are reduced to schwa in unstressed syllables. In my corpus, the vowel that most commonly reduces is /ɐ/, and even that does not always reduce. Other vowels only rarely reduce in unstressed syllables. Table 2.9 provides examples of non-reduced vowels in unstressed syllables.

Table 2.9. Non-reduced vowels in unstressed syllables

Example	Gloss
/piˈdə/	‘found’
/kuˈkɐ/	‘nail’
/kɨnˈdɐr/	‘pit’
/xʊʃˈruj/	‘beautiful’
/pɔkˈzɐ/	‘clean’
/fɐrˈt͡ʃɨ/	‘guest room’

Although schwa most frequently appears in unstressed syllables, it is not limited to unstressed syllables. Table 2.10 displays several words with schwa in a stressed syllable.

Table 2.10. Schwa in stressed syllables

Example	Gloss
/ˈdər.zəm/	‘take (1sg)’
/ˈwə.zi.ən/	‘see (3pl)’
/jənd͡ʒ/	‘ravine’
/ˈkʂə.ni/	‘hear (pst)’
/ˈmə.ri.əv/	‘die (2pl)’
/qərˈɣəz/	‘Kyrgyz’

Reduced vowels are very short and are sometimes elided completely. These phenomena can be observed in Figure 2.12, which displays spectrograms for two repetitions of the word /kəbɔs/ ‘cotton’ as produced by the same speaker. In the first spectrogram (a), a schwa of very short duration (~4 ms) can be observed between the /k/ and /b/. However, in the second spectrogram (b), there is no vowel between these two consonants. In the data used for this description, unstressed vowels are only (but not always) reduced to schwa when at least one of the adjacent consonants is voiced, as in /kəbɔs/, but never between two voiced consonants. When both adjacent consonants are voiceless, an unstressed vowel is always elided. Therefore, I

hypothesize that vowel reduction is most likely the diachronic mechanism that produced word-initial clusters of voiceless obstruents in Afghan Wakhi (cf. Figure 2.3).

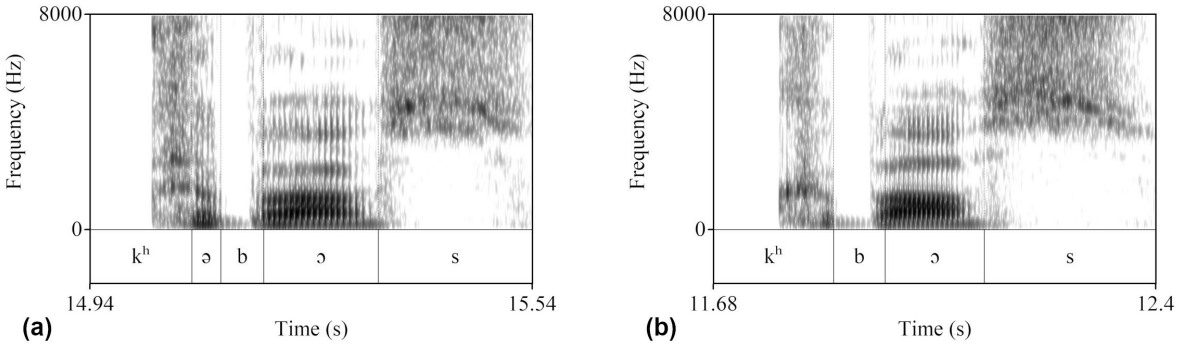


Figure 2.12. Vowel reduction (a) and elision (b) in the word /kəbɔs/ ‘cotton’

The lack of comparative data, combined with the lack of stress alternations in most words, currently makes it impossible to recover historical full vowels that have been reduced or elided in unstressed position. However, verbs as a class undergo stress alternation based on their inflection (cf. §2.3.2). Alternations in stress produce informative alternations between full and reduced vowels. For example, the stem vowel in the verb [ʃɐp-t] ‘nurse-3SG’ is elided entirely in the infinitival form [ʃp-ɐk] ‘nurse-INF’, as seen in Figure 2.13.

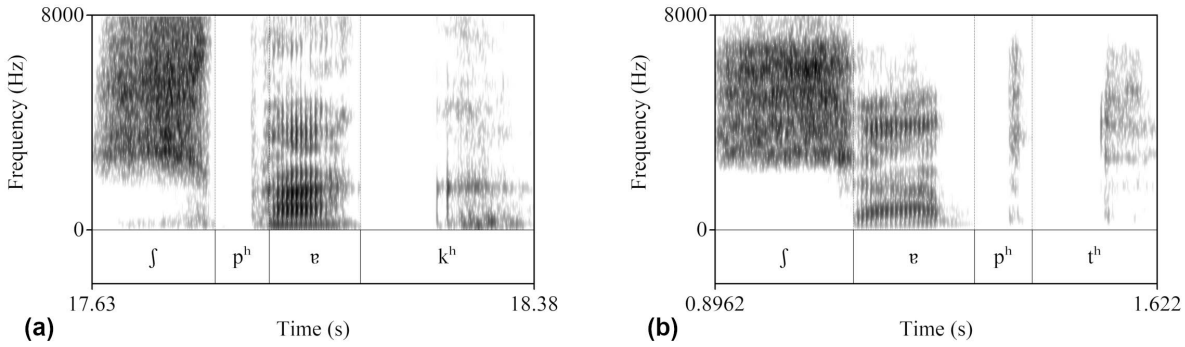


Figure 2.13. Vowel elision in [ʃp-ɐk] ‘nurse-INF’ (a) vs. [ʃɐp-t] ‘nurse-3SG’ (b)

2.2.4 Off-gliding of /ɨ/

The phoneme /ɨ/ is produced as a pure vowel only when it is the nucleus of a closed syllable, and only when it belongs to the same morpheme as the coda consonant. An example of this environment is the monomorphemic adjective /bɨd/ ‘filled’, which can be seen in Figure 2.14 (a). When the phoneme /ɨ/ appears in a morpheme-final open syllable, it is realized as the off-glided vowel /ɨw/ even if another morpheme fills the coda position. For example, the nonpast stem of the verb ‘to tell a lie’ is always realized as /bɨw/, even when inflected with a consonantal subject-indexing morpheme as in the word /bɨw-d/ ‘lie-3SG’. The off-gliding of /ɨ/ in this word is clearly visible in Figure 2.14 (b). Based on the presence of minimal pairs such as the one given in Figure 2.14, the off-glided vowel /ɨw/ has attained phonemic status in Afghan Wakhi.

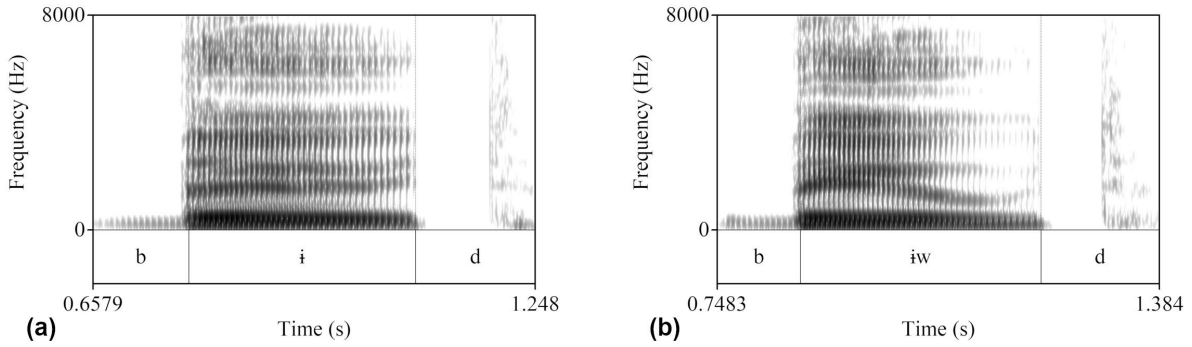


Figure 2.14. Morpheme-medial (a) vs. morpheme-final (b) realizations of /ɨ/

2.3. Prosody

An integral but often undescribed aspect of the phonetic structure of a language is its prosody. Prosody includes linguistic features such as syllable structure, stress, and intonation. I discuss the syllable structure and stress patterns of Afghan Wakhi in §2.3.1 and §2.3.2, respectively, but I leave the topic of intonation patterns for future research.

2.3.1 Syllable Structure

In Afghan Wakhi, a syllable must minimally comprise a vowel. However, most syllables include an onset or a coda, and many syllables have both. Double- and triple-consonant clusters are licit in both onset and coda position, but triple-consonant clusters cannot occur as the onset and coda of the same syllable. Therefore, practically speaking, there are two maximal syllable templates: CCCVCC and CVCCC. Examples of monomorphemic words that exhibit each attested syllable type are given in Table 2.11.

Table 2.11. Syllable types

	Word	Gloss
V	/e/	‘vocative’
VC	/ɨb/	‘seven’
VCC	/ʊt͡ʃk/	‘none’
CV	/bə/	‘also’
CVC	/kɐʂ/	‘boy’
CVCC	/fuks/	‘snake’
CVCCC	/bɐkʂt/	‘sister-in-law’
CCV	/spɔ/	‘1PL.GEN’
CCVC	/stʊç/	‘daughter-in-law’
CCVCC	/skɔrd/	‘bridge’
CCCVC	/ʃtrʊç/	‘betrothal’
CCCVCC	/sprəwj/	‘flower’

In monomorphemic words, the following consonant cluster patterns are found across syllable boundaries: C.C, CC.C, C.CC, and CC.CC. In multimorphemic words, this inventory expands to include CCC.C patterns across morpheme boundaries. Examples of words exhibiting each of these patterns can be seen in Table 2.12. The pattern C.CCC is not attested in my corpus, most likely because (a) all prefixes are CV monosyllables, and (b) because the number of words with triple-consonant onset clusters available to form the second word of a compound is relatively small compared to the other syllable types in the corpus.

Table 2.12. Cross-syllable consonant patterns

	Word	Gloss
C.C	/nɐjˈdin/	‘morning’
CC.C	/qɐrzˈdɔr/	‘indebted’
C.CC	/pɐrˈpriɣ/	‘scattered’
CC.CC	/pɐrgˈpri͡ʦ/	‘destitute’
CCC.C	/nəˈmurzg=v=i/	‘harrow=PL.OBL=ACC’

In Afghan Wakhi, a number of suffixes and enclitics take the form of a single consonant, e.g., *=n* ‘ABL’; *=v* ‘3PL’. When a consonantal morpheme precedes another morpheme that either

begins with or comprises a single vowel, it is syllabified as the onset and can be pronounced without difficulty. The final word in Table 2.12 illustrates this type of situation. However, when a consonantal morpheme attaches to a word that ends in a consonant and is not followed by a vowel, it may create an illicit word-final cluster. In such a case, the syllable structure is repaired by inserting a schwa between the two consonants, as seen in (24). I include epenthetic schwa in my transcriptions throughout this dissertation to facilitate ease of reading.

(24) /kɐʂ=v/ → *[kʰɐʂv] → [ˈkʰɐ.ʂəv]
boy=GEN
'the boy's' (SanGregory 2018: 10)

2.3.2 Stress

Stress in Afghan Wakhi follows two predictable patterns (SanGregory 2018: 5). For most word classes, stress is stem-final; clitics and inflectional affixes do not bear stress, but derivational suffixes do, causing stress to shift to the end of the new stem. Examples of stress assignment in words with inflectional vs. derivational morphology are given in Table 2.13.

Table 2.13. Nominal stress patterns

	Word	**Gloss**
Stem	[diˈqɔn]	'farmer'
Stem + Inflection	[diˈqɔn.əʃ]	'farmer.PL'
Stem + Derivation	[di.qɔnˈiɟ]	'farmer.NMLZ' (i.e., 'farming')

While other word classes exhibit stem-final stress, verb words typically exhibit stem-initial stress. Like other languages in the Pamir group (cf. Edelman & Dodykhudoeva 2009: 782), Afghan Wakhi has a three-stem verb system with different stems for the past, nonpast, and perfect tenses.[32] The past and nonpast stems both exhibit initial stress; however, the perfect stem,

[32] See §4.2 for an overview of the three verb stems in Afghan Wakhi.

which for many verbs is formed by the addition of the suffix *-ʊt* 'PRF', exhibits final stress. The final stress pattern found on perfect stems may be evidence that they belong to a different word class, or at the very least that they are less-typical members of the class of verbs. Examples of all three stems for the verbs meaning 'see' and 'sleep' are displayed in Table 2.14.

Table 2.14. Stress assignment for the verb stems 'see' and 'sleep'

	Nonpast	**Past**	**Perfect**
'see'	[ˈwin]	[ˈwin]	[wiˈnʊt]
'sleep'	[ˈrʊ.çʊp]	[ˈrɔ.çɔpt]	[rʊçˈpʊt]

As with other word classes, clitics and inflectional morphology attached to the verb stem do not bear stress, but derivational morphology does. For example, the infinitival suffix *-ʊk ~ -ɐk*, which attaches to the nonpast stem, derives a verbal noun that, like other nouns, bears final stress. Examples of inflected and derived verbs are given in Table 2.15, with verb words above the dotted line, and deverbalized words below the dotted line.

Table 2.15. Verbal stress patterns

	Word	**Gloss**
Nonpast, inflected	[ˈwʊ.də.rəm]	'grasp.1SG'
Past tense, inflected	[ˈwɔ.dɐr.ti]	'grasp.PST'
Present perfect tense, derived	[wʊ.dəˈrʊtk]	'grasp.PRF.PRS'
Infinitive, derived	[wʊ.dəˈrɐk]	'grasp.INF'

To determine the acoustic correlates of stress in Afghan Wakhi, I analyzed a set of vowel tokens in disyllabic and trisyllabic words, including examples of both final and initial stress. Pitch (f0) trajectories varied considerably by speaker and by repetition, indicating that pitch melody is not a cue of stress in Afghan Wakhi. The data currently available are too few to run a

statistical analysis, but a simple inspection of the data reveals a trend for stressed vowels to have longer duration than unstressed vowels.

2.4. Writing System

Wakhi has historically been an unwritten oral language; however, the last two decades have seen a rise in language development and documentation, including efforts to develop an orthography. Currently, three different orthographies exist, with the choice of script determined primarily by regional socio-political factors. Tajik Wakhi is written with a Cyrillic-based script (cf. Obrtelová 2017; Obrtelová 2019), Pakistani Wakhi with a Latin-based script (Bashir 2009), and Afghan Wakhi with an Arabic-based script.

2.4.1 Arabic-based Orthography

The first orthography for Afghan Wakhi was created approximately twenty years ago by two local men on behalf of their language community. A few modifications have been made over the course of subsequent language development efforts, but otherwise, that original orthography still forms the core of the current orthography. The official Arabic-based orthography for Afghan Wakhi comprises 48 letters and 2 diacritics; it was approved by the Afghan Academy of Sciences in October 2024. I consulted with the community and provided technical advice during the year-long orthography approval process, but all of the negotiations and official interactions were conducted by the community. Table 2.16 displays the letters of this orthography alongside the IPA symbol(s) for the sound(s) they represent. This table is organized alphabetically according to the order of the Afghan Wakhi alphabet and should be read top-to-bottom and right-to-left, starting at the upper-right corner.

Table 2.16. Arabic-based orthography for Afghan Wakhi

/u/	ۇ	/k/	ک	/z/	ظ†	/ʃ/	ش	/r/	ر	/x/	خ	/θ/, /s/*	ث	/ɔ/	آ
/ɨ/	ۋ	/g/	گ	ø	ع†	/ʂ/	ښ	/z/	ز	/d͡z/	څ	/d͡ʒ/	ج	/ɔ/, /ɐ/	ا
/ɐ/, [h]	ه	/l/	ل	/ɣ/	غ	/ç/	ښ	/ʒ/	ژ	/t͡s/	څ	/d͡ʐ/	چ	/b/	ب
/j/	ی	/m/	م	/f/	ف	/s/	ص†	/ʐ/	ږ	/d/	د	/t͡ʃ/	چ	/p/	پ
/i/	ي	/n/	ن	/v/	ڤ	/z/	ض†	/j/	ۍ	/ɖ/	ډ	/t͡ʂ/	څ	/t/	ت
[e]	ې	/w/	و	/q/	ق	/t/	ط†	/s/	س	/ð/, /z/*	ذ	ø, [h]	ح†	/ʈ/	ټ

* Indicates the pronunciation used in Arabic loanwords.

† Indicates a letter used only in Arabic loanwords.

Several things about the Afghan Wakhi orthography merit further explanation. First, as is evident from Table 2.16, some letters represent two sounds. For example, the letter ا (*alef*) can be used to represent both /ɔ/ and /ɐ/. The intended sound is contextually conditioned: *alef* represents /ɐ/ word-initially, but /ɔ/ elsewhere (word-medially and word-finally). The letters ث (*the*) and ذ (*thal*) represent different sounds in native words vs. loanwords borrowed from Arabic via Dari, which does not have interdental fricatives in its phoneme inventory. In these cases, the sound pronounced in loanwords is indicated with an asterisk (*). The letter ه (*heh ducheshma*) most typically represents the vowel /ɐ/ in Afghan Wakhi, although in word-initial position it can occasionally be pronounced as a subphonemic [h]. At times, it is unpronounced and serves simply as a carrier letter for a vowel diacritic.

In Afghanistan, orthographies are required to include all the original letters of the Arabic alphabet. Letters that are unnecessary from a strictly linguistic perspective (i.e., the sounds they represent in Arabic do not exist in a given language) must be retained for religious reasons. For this reason, the Afghan Wakhi alphabet includes some letters that are used only in Arabic loanwords. Such letters are indicated with a dagger (†) in Table 2.16. In these cases, the original

Arabic pronunciation is adapted to the Wakhi phonology, with the result that some consonant phonemes have multiple orthographic representations. Other letters are required for spelling purposes, but they may not be pronounced. The two letters that are often unpronounced are ح (*heh halwa*) and ع (*ayin*). When it is pronounced, *heh halwa* typically is read as [h]; *ayin* may variably be pronounced as the phonemic vowel /ɐ/ or as subphonemic [h] or [ʔ], depending on the word.

In Arabic, the glide /j/ and the vowel /i/ share an orthographic representation: the letter ي (*yeh*). In the Persian tradition, this letter is called *yah* and is written as ى. The Afghan Academy of Sciences specified that both letters be included in the Afghan Wakhi orthography, with ي used to represent /j/ and ى used to represent /i/. In practice, these are not two letters, but two glyphs of the same letter; the form and pronunciation are both determined by context.[33] Examples of the glyphs of letter *yah* as used in various contexts can be seen in Table 2.17.

Table 2.17. Contextually determined glyphs of the letter *yah*

Final	Medial	Initial	Isolation	
ى	ـيـ	يـ	ى	**glyph**
تى	تين	يَن		**example**

The letter ې was required by the Academy of Sciences to represent the phone [e]. Although [e] was most likely a distinct phoneme in the past, native speakers of Afghan Wakhi no longer distinguish it from [i]. Both phones are still in use, but testing with native speakers shows

[33] Unicode includes a special character called "Arabic Letter Farsi Yah" (codepoint 06CC) for the Persian *yah* that not only changes shape but also includes or omits the dots as necessary based on the letter's context.

that either sound may be substituted for the other without making a difference in meaning; overall [ɐ] is undergoing raising and has been merged with the phoneme /i/. Since the sound represented by the letter ې is subphonemic, the letter is mostly unused.

The two diacritics that are officially used as part of the Afghan Wakhi orthography are ◌َ (*zabar*) and ◌ُ (*pech*). *Zabar* represents the vowel /ɐ/, and *pech* represents both /ʊ/ and /ə/. Orthographically, a diacritic is written above the base letter that immediately precedes the vowel in terms of pronunciation. For example, in the word written as بَیْن in Table 2.14, the *zabar* (◌َ, /ɐ/) is above the *yah* (ی, /j/); in sequence, these are pronounced [jɐ] (whole word: /jɐn/ 'then'). In the Persian world, diacritics are rarely used, but Afghan Wakhi has quite a few minimal pairs involving /ɐ/ vs. /ʊ/ or /ə/, so distinguishing these vowels is necessary in some contexts. Marking these vowels can also help new readers understand when not to read an orthographic sequence of consonants as a cluster. However, marking all vowels makes written text look cluttered to native speakers and can make decoding written text more difficult, especially when diacritics are used over letters that have dots above the base glyph. Therefore, determining when to use vs. omit diacritics in individual words is an ongoing process.

2.4.2 Technical Orthography

The Arabic-based orthography is intended for use primarily by the Afghan Wakhi community. Although it meets the needs of the language community in their particular social, political, and religious context, it is not ideal for transcriptions intended for use in linguistic analysis. Several factors contribute to the need for a technical orthography that uses a Latin-based script.

One large barrier to using the Arabic-based script in linguistic examples is the fact that many linguists are unfamiliar with the Arabic alphabet. Therefore, in order to make my work accessible to as many people as possible, I must at a minimum supplement the Arabic-based orthography with one more familiar to the general linguistic audience. Even for those who are familiar with Arabic-based scripts, the extra letters not found in the standard Arabic alphabet, plus the areal preference not to write vowels, make determining the actual pronunciation of written text difficult.

Another significant challenge presented by the Afghan Wakhi orthography is the direction of the text. Like all orthographies that use Arabic-based scripts, the Arabic-based orthography for Afghan Wakhi is written from right to left—opposite the direction used for conventional Latin-based transcriptions of linguistic examples. As a result, attempts to combine and align Arabic- and Latin-based scripts in the same interlinearized example are cumbersome. For example, if the Arabic-based script is correctly presented with right-to-left formatting, the IPA line also presents the words from right to left, but each individual word reads from left to right, as seen in (25). Alternatively, if the IPA transcription is correctly presented from left to right, as shown in (26), the words on Arabic script line are also be presented from left to right, but each individual word still reads from right to left. In both cases, the words are aligned, but the phonemes and morphemes are not.

(25)

کَرتی	مکتب	ده	اُمی	تت	یُم
kɐrti	məktɐb	də	əmi	tɐt	jəm
kɐr-ti	məktɐb	də	əm=i	tɐt	jəm
put-PST	school	LOC	3SG.PROX=ACC	father	3SG.PROX

'His father put him in school.'

(26) یُم تت اُمی ده مکتب گَرتی
jəm tɐt əmi də məktɐb kɐrti
jəm tɐt əm=i də məktɐb kɐr-ti
3SG.PROX father 3SG.PROX=ACC LOC school put-PST
'His father put him in school.'

Another alternative is to present the Arabic-based transcription on the first line without attempting to align it with the data on the following lines, as seen in (27). This approach is the least-worst option, but it still presents formatting challenges (e.g., some digital sleight-of-hand is required to make the Arabic script line read right-to-left, but stay left-aligned on the page).

(27) یُم تت اُمی ده مکتب گَرتی.
jəm tɐt əm=i də məktɐb kɐr-ti.
3SG.PROX father 3SG.PROX=ACC LOC school put-PST
'His father put him in school.'

Given the challenges that arise when using an Arabic-based script in conjunction with Latin-based scripts, I choose not to transcribe examples using the Arabic-based orthography in this dissertation. Instead, I use an IPA-based technical orthography. The technical orthography comprises the IPA characters used to present the consonant and vowel phoneme inventories in §2.1 and §2.2, respectively. I do not mark stress in my transcriptions because word stress is predictable, as described in §2.3.2.

Since the technical orthography is based on phonemes, my transcriptions are broad and, in most cases, phonemic. However, several types of allomorphy (such as those described for several types of verbal morphology in §4.3.1, §4.4.1, and §4.5.1.1) are an exception. The Afghan Wakhi people are aware of the different forms these morphemes take in different contexts, and they prefer to write each of these morphemes in a way that orthographically represents how they are actually pronounced in a given word. Therefore, when using the technical orthography, I also write the allomorphs of these morphemes in order to maintain consistency across both orthographies.

2.4.3 Orthographic Examples

In this section I provide examples of a portion of text transcribed in both the Arabic-based and technical orthographies. This portion of text is an excerpt from a folktale called "Crazy Nazhmaan." Each sentence is transcribed in the Arabic-based orthography (read right-to-left) on the first line and in the technical orthography (read left-to-right) on the second line. The third line of each example gives an English free translation for the sentence. Since the two orthographies read in opposite directions, the words on the two orthographic lines are not aligned. Neither are they parsed or glossed at the morphemic level, since the purpose of these examples is simply to demonstrate what the two orthographies look like in actual use.

(28) اینی وُز سَڤر نیڤ ژیندە بنَنم.
ini wuz sɐvər niv ʒindɐ çɐnəm.
'So I will now tell you a folktale.'

(29) دیوانه نژمان تت توُ بازرگان.
diwɔnɐ nɐʒmɔn tɐt tu bɔzərgɔn.
'Crazy Nazhmaan's father was a trader.'

(30) یَوش رُوِردی تجارت.
jɐwəʂ rəwʲdi tid͡ʒɔrɐt.
'He used to go trading.'

(31) شهر بهُ شهرش رُوِردی.
ʂɐr bʊ ʂɐrəʂ rəwʲdi.
'He used to go city to city.'

(32) یک سالش نَشتی، بوُ سالش نَشتی.
jɐk sələʂ nɐʂti, bu sələʂ nɐʂti.
'He would disappear for a year; he would disappear for two years.'

(33) یُم دیوانه نژمان غَل نهُ توُ.
jəm diwɔnɐ nɐʒmɔn ɣɐl nʊ tu.
'This Crazy Nazhmaan didn't exist yet.'

(34) یُم دیوانه نژمان تَولید ڤیتی.
jəm diwɔnɐ nɐʒmɔn tɐwlid viti.
'Crazy Nazhmaan was born.'

(35) یُم کمُک نظری تۏ.
jəm kɐmʊki nɐzari tu.
‘He was kind of a seer.’

(36) یُم دی دی دی.
jəm di di di.
‘Some time passed.’

(37) یُم تت اُمی ده مکتب گرتی.
jəm tɐt əmi də məktɐb kɐrti.
‘His father put him in school.’

(38) یُم مکتبی، اگر دیږَر زهش، مثالی، مؤی پَس سبَق درزن، یُم روُز به روُز درزد.
jəm məktɐbi, ɐgɐr dijɐr zɐəʃ, misɔli, mɨj pɐs səbɐq dərzən, jəm ruz bʊ ruz dərzd.
‘This schoolboy, if the other students, for example, learn a lesson after a month, he learns it after a day.’

2.5. Summary

In this chapter, I have briefly described the phonology of Afghan Wakhi. With thirty-five consonant phonemes, seven vowel phonemes, and ten phonemic off-glided vowels, Afghan Wakhi has a total phoneme inventory of fifty-two sounds. Certain natural classes are subject to phonological processes that include word-final obstruent devoicing, liquid devoicing, nasal assimilation, vowel reduction or elision, and off-gliding. The syllable structure permits triple consonant clusters as both onsets and codas, although both may not occur in the same syllable. Stress is stem-based and is predictable based on word class and, for verbs, stem type. Afghan Wakhi is written with two different orthographies: an Arabic-based orthography used by native speakers, and a Latin-based technical orthography used for linguistic analysis.

CHAPTER 3

REFERRING EXPRESSIONS

In this chapter, I describe the inventory of referring expressions in Afghan Wakhi. This inventory includes noun phrases and subject-indexing clitics. I begin in §3.1 with an overview of noun phrases, including the syntactic distribution of noun phrases and three types of morphology unique to the noun phrase (number, case, and specificity marking). Section 3.2 is devoted to nouns and their characteristics, including derivational strategies for creating nouns from other word classes. In §3.3, I describe many types of pronouns, including demonstrative pronouns, personal pronouns, reflexive pronouns, the reciprocal pronoun, and interrogatives. The internal structure of noun phrases is the topic of §3.4; this section includes native constructions used for noun modification and possession, a borrowed Persian construction that provides an alternate strategy for associating a head noun with its modifiers; and relative clause constructions. I present the inventory of subject-indexing clitics in §3.5, and I summarize the chapter in §3.6.

3.1. Noun Phrases

The first category of referring expressions in Afghan Wakhi is the noun phrase (NP). In this section, I am concerned with the features common to all NPs, regardless of their internal composition. These include the syntactic distribution of NPs (§3.1.1) and inflectional morphology that attaches at the NP level: number enclitics (§3.1.2), case enclitics (§3.1.3), and the specificity enclitic (§3.1.4).

3.1.1 Syntactic Distribution

An NP may comprise a single noun word, a pronoun, or a phrase headed by a noun. I discuss the internal structure of NPs in subsequent sections, but for now I give some brief examples to anchor my discussion of the syntactic distribution of NPs. Examples of each type of

NP are given in (39) – (41), respectively. In each of these examples, the bracketed phrase functions as the syntactic subject of its clause. This distribution pattern shows that nouns, pronouns, and phrases headed by a noun can all instantiate the same phrasal category: the NP.

(39) [*diw*] *wəz-di.*
ogre come-PST
'The ogre came.' (25.100)

(40) [*wuz*] *xiɐr=əm vit-k.*
1SG.NOM old=1SG become-PRS
'I have gotten old.' (02.33)

(41) [*ji sʊkr ʃɐt͡ʃ*] *wəz-di.*
one red dog come-PST
'A red dog came.' (25.136)

In addition to functioning as the subject, an NP may function as the direct object (42) or indirect object (43) of a predicate. Furthermore, an NP may serve as the object of a preposition (44), an adnominal possessor (45), or a descriptive modifier within a larger NP (46).

(42) *tu* [*məl=v=i*] *ðit͡s.*
2SG.NOM flock=PL.OBL=ACC milk.2SG
'Milk the flocks!' (03.50)[34]

(43) *wuz tɐw=i* [*ðɐj=ər*] *rɐnd-əm.*
1SG.NOM 2SG=ACC husband=DAT give-1SG
'I will give you to a husband.' (03.44)

(44) *rʊʂt* [*də* [*kʊnd͡ʒ*]].
go.3SG LOC corner
'He goes into the corner.' (25.394)

(45) *jɐkdɐm* [[*ʊt kɐʂ*] *t͡ʂiʐm*] *ʊʈ wɔst.*
at.once MED boy eye open become.3SG
'At once the boy's eyes open.' (25.549)

[34] Example (42) is an imperative clause. Like many imperatives in Afghan Wakhi, it includes a subject pronoun. I omit this pronoun in the English free translation to convey the illocutionary force of the imperative.

(46) [[***nɔmzɔd-i***] *ɐnɔnɐt*] *jəm*
engaged-NMLZ tradition PROX

ki, *t͡sʊ* *ɐmsɔjɐ=n* *t͡sbɨr* *pɐnd͡z* *xɐlg* *rʊʂt.*
COMP from neighbor=ABL four five person go.3SG
'Engagement traditions are these that, from the neighbors four or five people go.'
(TEX-0003.46)

An NP can also function as the preverb of a light verb construction (LVC), as seen in (47) and (48), below. As a preverb, the NP provides the core semantic content of the predicate, while the light verb contributes primarily (but not only) grammatical information. For a detailed discussion of LVCs in Afghan Wakhi, see Chapter 6.

(47) *t͡s=ʊt* *d͡ʒɐj=əm* [[***ɐrɐkɐt***] *kər-tɨ*].
from=MED place=1SG departure do-PST
'I departed from that place.' (lit., 'departure did') (12.08)

(48) [[***ʧi*** ***tɐsmim=i***] *wʊdər*]
self.GEN decision=ACC grasp.2SG

ki *tɐrək* *ɐrusi* *t͡sɐr-ən*
COMP 2SG.DAT wedding do-1PL
'Decide so we can perform your marriage.' (lit., 'Hold your decision so we can do marriage for you.') (02.36)

In this section, I have shown that phrases containing a single noun word, a pronoun, or a more complex noun phrase headed by a noun all share the same syntactic distribution and thus are all noun phrases. In the following sections, I describe the morphology that inflects the NP, beginning with number marking.

3.1.2 Number Marking

Noun phrases in Wakhi may optionally be inflected for number. By default, the unmarked form of an NP is interpreted as being singular, as is the case for *pərt͡ʃəd* 'girl' in (49). An NP that is uninflected for number may alternatively be interpreted as generic, as seen for both *sɐpt* 'basket' and *t͡ʃɨɣ* 'reed' in (50).

(49) ***pərtʃ͡ɔd*** *mɐrək çɐt-ɨ ki. . .*
girl 1SG.DAT say-PST COMP
'The girl said to me. . .' (TEX-0003.9)

(50) ***sɐpt*** *ʦ͡ʊ* ***ʧ͡ɨɣ=ən*** *ʤ͡ɨr wɔst.*
basket from reed=ABL made become.3SG
'Baskets are made from reeds.' (Baskets 1)

Wakhi has two plural clitics, *=ʃ* and *=v*.[35] The first of these, *=ʃ*, is used to mark plural number only in the Default case, as seen in (51). The second suffix, *=v*, is used to mark plural number in cases other than the Default or Nominative,[36] as (52) illustrates.

(51) *wɔz jəm* ***xɐlg=əʃ*** *wəz-di də xun.*
then PROX person=PL.DFLT come-PST LOC house
'Then these people came home.' (TEX-0003.26)

(52) *pɔtʃɔ nɔziun kʊnd digɐ çɨ nɔziun* ***pʊtr=v=ər*** *pʈɔk gɔç-t.*
king favored wife DISC self.GEN favored son=PL.OBL=DAT biscuit make-3SG
'The king's favored wife makes biscuits for her favored sons.' (25.35)

The oblique plural marker must typically be followed by a case marker, as in (52), although on rare occasions it may stand alone when used to mark an adnominal possessor, as seen in (53).

(53) ***kɐʂ=əv*** *tɐt*
boy=PL.OBL father
'the boys' father' (SanGregory 2018: 70)

3.1.3 Case Marking

An important type of inflectional morphology found on noun phrases in Afghan Wakhi is CASE, which Blake (2001: 1) defines as a "system of marking dependent nouns for the type of

[35] Recall from §2.3.1 that a schwa is inserted before consonantal morphemes to repair illicit consonant clusters.

[36] From the ancient Greeks to modern typology, linguistic tradition often refers to the non-nominative cases as the "oblique cases" (Blake 2001: 18–19, 30). In addition, modern Iranian linguistics uses the term "oblique" to refer to the second case in a two-term case system (the other case being the "direct" case) (cf. Haig 2008: 13). Drawing from these traditions, I use oblique (OBL) to gloss the Afghan Wakhi plural marker used on NPs in case forms other than the Nominative or Default.

relationship they bear to their heads." Cross-linguistically, case marking may indicate either (a) the grammatical relation, or (b) the semantic role that a referring expression holds in a given construction (Blake 2001: 31). Case in Afghan Wakhi serves both functions. An example of case marking a grammatical relation can be seen in (54), where the NP *piʃ=i* 'cat=ACC' functions as the direct object of the verb *didij-d* 'see-3SG'. Example (55) illustrates the use of case to indicate a semantic role: the NP *xun=ən* 'house=ABL' bears Ablative case marking and functions as an adjunct argument of Source.

(54) *kɐ̰ʂ=əʂ* ***piʃ=i*** *didij-d.*
boy=IPFV cat=ACC see-3SG
'The boy sees the cat.' (FN 2.157.2)

(55) *t͡sʊ* ***xun=ən*** *wəzi-ən.*
from house=ABL come-3PL
'They come from the house.' (Wolf Attack 25)

In Afghan Wakhi, case markers are phrasal clitics that attach to the end of an NP.[37] Since the structure of the NP is head-final, case markers usually attach to the head noun (56).[38] However, as example (57) shows, a word from another class (typically an adjective) may occur phrase-finally in NPs that use the Persian *ezafe* construction.[39] In such constructions, the case marker still attaches to the final word, regardless of its word class.

(56) *wuz=əm* [*ɐw* *tʃuʈ-i*] *=v=i* *d͡ʒɐm* *kər-ti* *də* *çɨ* *kɐf.*
1SG.NOM=1SG 3SG.DIST torn-NMLZ=PL.OBL=ACC gathered do-PST LOC self.GEN palm
'I gathered its pieces together in my hand.' (07.03)

(57) *xʊj,* *wuz=əm* *də* *t͡ʃilgʊ̰ʂɐ* *dig=əm* [*diw=i* *sɐfid*] ***=ər*** *çʊt͡ʃ* *çʊt-k.*
INTJ 1SG.NOM=1SG LOC forty.handled pot=1SG ogre=EZ white=DAT bread make-PRS
'Well, I have made food for the white ogre in the forty-handled pots.' (25.174)

[37] See Zwicky (1977: 6–7) for a description of phrasal clitics, which he calls "phrasal affixes."

[38] See §3.4 and its subsections for a more complete description of word order in Wakhi noun phrases.

[39] See §3.4.5 for a description of *ezafe* constructions and their use in Afghan Wakhi.

Wakhi has been described as having "the most complex of the case systems found in the Pamir group" (Payne 1980: 178). In the literature, no two descriptions of the Wakhi case system are identical. Shaw, Morgenstierne, and Lorimer all describe inventories of seven cases, although the exact composition of each individual case inventory is slightly different. Shaw's inventory comprises nominative, genitive, dative, accusative (with two subtypes), locative, ablative, and instrumental (1876: 12–13). Morgenstierne includes two types of genitive (attributive and predicative) and only one accusative, in contrast to Shaw's one genitive and two accusatives (1938: 494–495). Lorimer differs from the other two in naming a distinct transitive nominative case (1958: 78, 123–124). In a departure from previous descriptions, Bashir describes the language as having only five cases: two primary cases, and three additional cases that are built upon the two primaries. She calls the two main cases direct and oblique (oblique having two subtypes); the three subcases that she identifies are (1) the possessive / genitive case, (2) the dative / goal case, and (3) the ablative / source case (Bashir 2009: 828).

In my analysis, Afghan Wakhi has eight cases: Nominative (NOM), Default (DFLT), Accusative (ACC), Dative (DAT), Genitive (GEN), Possessive (POSS), Ablative (ABL), and Vocative (VOC). Morphological forms corresponding to these eight cases can be identified across all types of noun phrases, although different types of noun phrases exhibit different class-internal patterns of syncretism, suppletion, and case-marking potential. Given these differences, I use "nominal NP" to refer to an NP headed by a noun word (regardless of whether the head noun is bare or accompanied by modifiers), and I use "pronoun" to refer to an NP headed by a pronoun.

Table 3.1 displays a list of case forms and functions for nominal NPs and 3rd person pronouns. A full case paradigm for speech act participant (SAP; i.e., 1SG and 2SG) pronouns is

given in Table 3.5; case forms for all personal pronouns can be found in Table 3.6 and Table 3.7 I describe and provide examples of each case and its associated functions in §3.1.3.1 – §3.1.3.8.

Table 3.1. Case markers and functions for nominal NPs and 3rd person pronouns

Case	Form	Function
DFLT (SG)	=*Ø*	subject, direct object, object of preposition, adnominal possessor, extra-syntactic NP, non-initial subject*
DFLT (PL)	=*ʃ*	subject
ACC	=*i*	direct object
DAT	=*r*	indirect object, goal, beneficiary, purpose clause
POSS	=*n*	predicative possessor, adnominal possessor (specific constructions)
ABL	=*n*	source, origin, comparison, instrument, comitative, partitive
VOC	=*i*	direct address

* That is, the syntactically "unmarked" and citation form.

The Form column in Table 3.2 gives the generic composition of each case form for the SAP pronouns. An individual pronominal SAP case form may be suppletive, or it may use another pronominal case form as the stem to which a case enclitic attaches. The composition of a morphologically complex case form is given as a formula in which the case form used as the stem is given in small caps, followed by the case enclitic that attaches to it. For example, the formula GEN=*n* indicates that a Genitive pronominal stem plus the enclitic =*n* creates a Possessive case pronoun. First- and second-person plural pronouns are similar but not identical to SAP pronouns in case marking and formation.

Table 3.2. Case forms and functions for SAP pronouns

Case	Form	Function
NOM (SG)	suppletive	subject
NOM (PL)	suppletive	subject
DFLT	suppletive	subject, direct object, object of preposition, extra-syntactic NP, non-initial subject, adnominal possessor in EZ-construction
ACC	DFLT=*i*	direct object
DAT	suppletive=*r*	indirect object, goal, beneficiary
GEN	suppletive	adnominal possessor
POSS	GEN=*n*	predicative possessor, adnominal possessor (specific constructions)
ABL	DFLT=*n*	source, origin, comparison, instrument, comitative, partitive

3.1.3.1 Nominative Case

NOMINATIVE is the name traditionally given to the case used for the citation form of nouns (Blake 2001: 30–31; Creissels 2009: 450, 455). The term "nominative" is also commonly used for the case that marks the subject of the clause in case systems that follow a nominative-accusative alignment pattern (i.e., when the subjects of intransitive and transitive clauses are marked or treated identically). Cross-linguistically, the nominative case is often (although not always) unmarked.

First- and second-person pronouns (both singular and plural) are the only NPs in Afghan Wakhi that have dedicated Nominative forms. The nominative forms of these pronouns can only be used as the subject of a clause. Examples of 1SG (58), 1PL (59), 2SG (60), and 2PL (61) Nominative pronouns are bolded below.

(58) [***wuz***] *jupk çɐk nʊ=diʃ-əm.*
1SG.NOM water make.INF NEG=know-1SG
'I don't know [how] to water [the crops].' (06.098)

(59) [***sɐk***] *jɐw=i tɐr t͡sət͡sɔxt rədɔw bɐs wəzi-ən?*
1PL.NOM 3SG.DIST=ACC 2SG.DAT how give.INF enough come-1PL
'How can we give her to you?' (TEX-0014.01-52)

(60) [***tu***] *bɔjɐd ɐrusi t͡sɐr.*
2SG.NOM must marriage do.2SG
'You must get married.' (02.05)

(61) [***sɐjəʃ***] *jɐw mɐr t͡ʃɐlg-əv.*
2PL.NOM 3SG.DIST 1SG.DAT want-2PL
'You [PL] request her for me.' (TEX-0003.015)

3.1.3.2 Default Case

Multiple linguists have observed that NPs used in extra-syntactic functions, such as quotations, appositives, and left-dislocation (among others), often take the same case marking or form (cf. Schütze 2001: 210–216; Caha 2024: 3; Creissels 2009: 450). Such NPs may be considered caseless (Schütze 2001: 230) and / or to occur in a DEFAULT case (Schütze 2001: 206; Caha 2024: 2–4; Creissels 2009: 456) in languages with case marking. The "default" case may also be used to mark NPs in certain syntactic functions (Creissels 2009: 450). Cross-linguistically, the two cases most commonly identified as having "default" (as well as syntactic) functions are nominative or absolutive (Caha 2024: 2).

I use capitalized "Default" in a slightly different sense than Creissels (2009: 456): I use it for a case form in Afghan Wakhi that is unmarked (nominal NPs, 1st and 2nd person plural pronouns, and all 3rd person pronouns) or formally distinct from both the Nominative (§3.1.3.1) and the Accusative (§3.1.3.3) case forms (SAP pronouns; i.e., 1SG and 2SG). For all such forms, I use the absence of a case gloss to indicate the Default case.

In Afghan Wakhi, the Default case is the unmarked and most widely distributed case form. A Default (unmarked) nominal NP or 3rd person pronoun may function as a subject in any tense (62) – (63) or an adnominal possessor (64) – (65), depending on the syntactic context in which it appears. The Default form of nominal NPs also serves as the stem for the oblique case markers.

(62) [***kutʃ***] *t͡sʊ* *pɔmir=ən* *xɐm-di.*
migration from Pamir=ABL descend-PST
'The migration descended from the Pamirs.' (TEX-0003.44)

(63) [***jʊt***]*=əʂ* *rəʝiʂ* *nɐst.*
3SG.MED=IPFV beard COP.NEG
'It's not a beard.' (02.20)

(64) *sɐk* [[***mʊlə***] *xərd͡ʒin*]*=i* *gɔt-ən.*
1PL.NOM Mullah saddlebag=ACC find-1PL
'We will find Mullah's saddlebag.' (TEX-0025.7)

(65) [[***jɐw***] *xun* *xɐlg*]*=ər* *ɐlɔjid* *tufɐ jund.*
3SG.DIST house person=DAT separately gift carry.2SG
'For her family, you take gifts separately.' (TEX-0003.048)

The Default form of any NP (nominal or pronominal) may function as a direct object (66) – (68) or the complement of a preposition (69) – (71).[40]

(66) *wuz* *sɐv=ər* *niv* [***ʒindɐ***] *çɐn-əm.*
1SG.NOM 2PL=DAT now folktale say-1SG
'I will now tell you the folktale.' (TEX-0014-1.11)

(67) *wɔz=əm* [***jəm***] *kər-ti* *ʂəriʂ.*
then=1SG 3SG.PROX do-PST glue
'Then I glued it.' (08.11)

[40] In Afghan Wakhi, all three demonstrative pronouns (differentiated by deixis) also function as 3SG pronouns. These pronouns have reduced forms that can stand alone; these forms also frequently cliticize to prepositions, as seen in (69). For a detailed description of these and other properties of the demonstrative / 3SG pronouns, see §3.3.1.

(68) *wuz* [***sɐv***] *jund-əm.*
1SG.NOM 2PL carry-1SG
'I will marry you [PL].' (lit., 'I will carry you [PL].' (25.207)

(69) *bʊt rʊɟn d=*[***əm***] *xun nɐst.*
also oil LOC=3SG.PROX house COP.NEG
'There is no more oil in the house.' (04.03)

(70) *ɐ=t͡s=əm=ən=ən* [*tɔ* [***zibɔk***]] *rəwɟ-di.*
EMPH=from=PROX=ABL=1PL until Zebaak go-PST
'We went from here to Zebaak.' (TEX-0023.30)

(71) *zɟɨ tɐt* [[*skʊ* [***mɐzɟ***]] *ɐmr kər-ti ki . . .*
1SG.GEN father on 1SG command do-PST COMP
'My father commanded me that . . .'

The Default case form of SAP pronouns is used in contexts and functions where no other case is deemed acceptable by native speakers. For example, the Default case is used for 1SG, 2SG, and 2PL subjects of clauses that do not follow the typical SOV constituent order. This includes clause-external subjects, i.e., subjects that are either left-dislocated (72) or right-dislocated (73), as well clause-internal subjects that follow the direct object instead of preceding it (74).

(72) [***tɐw***], *mɐr səduj-d*
2SG 1SG.DAT appear-3SG

ki tɐw ʊt͡ʃk ɐ=rɐ ʂɐd nɐg rʊç-k nʊj.
COMP 2SG none EMPH=down.to fold direction go-PRS NE.G.SBJV
'[As for] you, it appears to me that you haven't gone down to the sheep fold at all.' (03.19)

(73) *zɟɨ ɟuz=ʊt bʊ ɟir-ɔv-di,* [***tɐw***]*!*
1SG.GEN firewood=2SG also turn-CAUS-PST 2SG
'You spilled my firewood too, you!' (05.31)

(74) *xʊʃruj xərɔk təhɔm* [***tɐw***] *d͡ʒɨr kər-ti.*
beautiful goods meal 2SG prepared do-PST
'You beautifully made those goods [into] a meal.' (23.12)

The Default case-form of a pronoun may be used instead of the Nominative to mark subjects that are speech act participants of past or perfect predicates, as in (75) and (76). This use of the Default case is a type of differential subject marking (DSM). For more information about DSM in Afghan Wakhi, see §3.1.3.9 and SanGregory (2018).

(75) *jɐn jɐw=əʂ ki ɣɐ xʊʃruj bɐjt çɐt-i,*
then 3SG.DIST=IPFV COMP INTS beautiful song say-PST

[***mɐz***] *=əʂ rʊqɔs-i kər-t.*
1SG=IPFV dancer-NMLZ do-PST
'Then when he was singing so beautifully, I danced.' (21.04)

(76) [***tɐw***] *jɐ mɔl=v=i t͡ʃizr nʊ=ðʊç-k?*
2SG DIST livestock=PL.OBL=ACC why NEG=milk-PRS
'Why haven't you milked the livestock?' (03.02)

As I describe in §3.4.5, speakers of Afghan Wakhi sometimes use an NP construction borrowed from Persian (the *ezafe* construction). When 1SG, 2SG, or 2PL pronouns are used as adnominal possessors in such constructions, they appear in the Default case (77).

(77) [*ʃtrʊç kəʈ-ɐk=i* [***mɐz***]] *qism=i tu ki . . .*
flour put-INF=EZ 1SG kind=SPEC COP.PST COMP
'My engagement was like this, that . . .' (lit., 'The flour putting of me was this kind')[41]
(TEX-0003.006)

3.1.3.3 Accusative Case

The ACCUSATIVE case is marked via the enclitic *=i* 'ACC'. The Default case form is the stem to which the Accusative enclitic attaches, whether that be an SAP pronoun (78), non-SAP pronoun (79),or nominal NPs (80). The sole function of the Accusative case is to mark an NP (of any type or person) that has the grammatical relation of direct object in its clause.

[41] *ʃtrʊç kəʈɐk* (lit., 'to flour put') is a light verb construction (cf. Chapter 6) that means 'to engage' or 'to betrothe'.

(78) *e, çɐt-i,*
VOC say-PST

tu [*mɐʐ*]**=*i*** *bʊ* *dərz* *jund!*
2SG.NOM 1SG=ACC also take.2SG carry.2SG
‘“Oh,” he said, “Take me (there)!”’ (TEX-0027.06)

(79) *tu* [*əm*]**=*i*** *nɨs!*
2SG.NOM 3SG.PROX=ACC lose.2SG
‘Get rid of her!’ (lit., ‘Lose her!’) (04.42)

(80) *wuz=əm* *ɐw* *ðəwʲ-ni,*
1SG.NOM=1SG 3SG.DIST milk-PST

ɐ=[*ʒɐrʒ*]**=*i*** *jut-i* *tɐ* *xun.*
EMPH=milk=ACC carry-PST up.to house
‘I milked them (and) carried the milk up to the house.’ (03.21)

3.1.3.4 Dative Case

The DATIVE case marker is the enclitic *=r(ək)* ‘DAT’. The form *=rək* (along with several other variants) is included as an option for marking Dative case on both nominal NPs and pronouns in several descriptions of Wakhi (Morgenstierne 1938: 487; Grünberg & Stéblin-Kamensky 1988b: 18, 25; Bashir 2009: 829). However, in my corpus, *=rək* is used only on pronouns, particularly SAP pronouns such as the one seen in (81). The reduced form *=r* is the only Dative form used on nominal NPs, and it is also commonly used on pronouns (including SAP pronouns).

(81) *tu* [***mɐrʊk***] *sɔd͡ʒiq* *wʊzəm.*
2SG.NOM 1SG.DAT gum bring.2SG
‘Bring me some chewing gum.’ (05.16)

Although the Dative enclitic is clearly identifiable on pronouns, for most pronouns the apparent stem is not a morpheme synchronically attested elsewhere in Afghan Wakhi. For example, *mɐr* ‘1SG.DAT’ and *mɐʐ* ‘1SG’ (Default case) both share the same beginning (*mɐ*), but since the coda (*ʐ*) of *mɐʐ* cannot be analyzed as a meaningful unit, neither can the *mɐ*. When a

Dative-marked pronoun does have a clear stem, such as *sɐk=ər* '1PL=DAT', I separate and gloss the stem and Dative enclitic as individual morphemes. Otherwise, I gloss Dative pronouns as portmanteau morphemes.

The Dative case is also used to mark an NP that has the grammatical relation of indirect object, as seen in (82) and (83). The Dative may additionally be used to mark an optional argument, such as a Beneficiary (84) or a Goal (85).[42]

(82) *kɐm-ʊk=i çʊt͡ʃ* [***mɐr***] *rɐnd-əv.*
a.little-DIM=EZ bread 1SG.DAT give-2PL
'Give me a little bit of bread.' (25.218)

(83) *sɐk niv* [*ti tɐt*]***=ər*** *t͡ʃiz çɐn-ən?*
1PL.NOM now 2SG.GEN father=DAT what say-1PL
'Now what will we tell your father?' (04.10)

(84) *xʊj, wuz=əm də t͡ʃilgʊʂɐ dig=əm* [*diw=i sɐfid*]***=ər*** *çʊt͡ʃ çʊt-k.*
INTJ 1SG.NOM=1SG LOC forty.handled pot=1SG ogre=EZwhite=DAT bread make-PRS
'Well, I have made food for the white ogre in the forty-handled pots.' (25.174)

(85) *jiɻjun wɐxt=ən=əʂ rəwɻ-di* [*mərdʊm*]***=ər.***
some time=1PL=IPFV go-PST people=DAT
'Sometimes we used to go to the people.' (TEX-0023.16)

In addition to marking arguments of the predicate, the Dative case is also used to mark an adverbial purpose clause. When marking a purpose clause, the Dative enclitic usually attaches to the infinitive form of a verb, as in (86) and (87).

(86) *t͡ʃɐld=əv* [*ðɐrt ding*] *=v=****ər*** *sɐk jut-i.*
want=3PL manure hit.INF=3PL=DAT 1PL.NOM carry-PST
'They requested (and) took us to spread manure.' (TEX-0023.019)

[42] For a list and definitions of the semantic roles used in this dissertation, see §1.6.1.

(87) *ki* *sɐfid* *wəz-d*
COMP white come-PST

ʊt *ɐ=d͡zi* *ɐ=təm* *xun* *nɐg* [*t͡ʃərm-ɐk*] **=ər**.
and EMPH=way EMPH=up.to.PROX house direction go.in-INF=DAT
'When the white [ogre] came to go up to the house like this . . .' (25.190)

3.1.3.5 Genitive Case

Cross-linguistically, GENITIVE (GEN) is the label typically given to the case used to mark adnominal possessors (Blake 2001: 149). In Afghan Wakhi, first- and second-person pronouns (both singular and plural) have suppletive Genitive forms. Examples of 1PL and 2SG adnominal possessors in the Genitive case are bolded in (88) and (89), respectively.

(88) *wəz-di* *trəm* [[**spɔ**] *nɐg*].
come-PST over.to.PROX 1PL.GEN direction
'It came over toward our direction.' (TEX-0130.23)

(89) *sɐk* [[**ti**] *gɐp*] *=i* *wʊdər-ən.*
1PL.NOM 2SG.GEN chat=ACC hold-1PL
'We heed your words.' (25.032)

Nominal NPs and 3rd person pronouns functioning as adnominal possessors do not take any case marking. Instead, the Default case form precedes the head noun, as in (90) and (91).[43] Both syntax and discourse context make it clear when a nominal NP or third-person pronoun should be interpreted as a possessor.

(90) *sɐk* *mərdʊm* *ɐ=*[[*jəm* [**mɔl**]] *ˌjər*] *=i* *jid͡ʒin* *gɔç-ən.*
1PL.NOM people EMPH=PROX livestock wool=ACC felt make-1PL
'We people make the livestock's wool [into] felt.' (TEX-0118.06)

[43] For a description and examples of NPs that have other modifiers in addition to a possessor, see §3.4.4.

(91) *ki* *wizit,*
COMP come.3SG

[[***jəm***] *jɐʃ*] *əm* *kɐ̨s=i* *win-d.*
3SG.PROX horse PROX boy=ACC see-3SG
'When he [the ogre] comes, his horse sees the boy.' (25.116)

3.1.3.6 Possessive Case

Afghan Wakhi has no verb meaning 'to have'. Instead, it uses a nonverbal predicate construction to express predicative possession. A possessive clause minimally includes a Possessor and a Possessee, although the copula is required to indicate tense or polarity other than nonpast affirmative. For a more detailed description of possessive constructions, see §5.2.2.5.

In a possessive clause, the possessor is marked with the enclitic *=n* 'POSS'. I use Pacchiarotti's (2020: 242, 265) term POSSESSIVE (POSS) for this case to distinguish it from the Genitive, which only marks adnominal possessors that are pronouns (cf. §3.1.3.5). For nominal NPs and 3rd person pronouns, the Possessive enclitic attaches directly to the regular (Default) stem like any other case marker (92). However, the Possessive case marker attaches to the Genitive form (cf. §3.1.3.5) of first- and second-person pronouns (93).

(92) *ji* *xɐnduni* [*əm* *kɐ̨s*] ***=ən.***
one puppy PROX boy=POSS
'This boy has a puppy.' (25.55)

(93) *ji* *çɨj* [*zɨ̨*] ***=n*** *də* *diw=i* *ʂɨw* *kɐf.*
one sister 1SG=POSS LOC ogre=EZ black palm
'I have a sister in the hand of the black ogre.' (25.210)

Although the Possessive case primarily functions to mark the possessor argument of a possessive clause, it can also be used in two different constructions to mark adnominal possessors. Examples of each of these constructions are given in (94) and (95). For additional examples and discussion, see §3.4.2.

(94) [[*jɐ xɐrbuzɐ*] **=n** *jɐ pist]=i jɐw-ən*
DIST cantaloupe=POSS 3SG.DIST skin=ACC eat-3PL

jɔ nʊj ɐ=mɐɣz=i?
or no EMPH=brain=ACC
'Do they eat the cantaloupe's skin or rather its flesh?' (06.25)

(95) *didiɟ-d ki* [*jəm* *t͡ʃʲiʐm* [*əm*] **=ən**] *ʊt.*
look-3SG COMP 3SG.PROX eye 3SG.PROX=POSS open
'He looks if her eyes are open.' (lit., 'He looks that the eyes of hers [are] open.') (25.395)

3.1.3.7 Ablative Case

The label ABLATIVE is prototypically assigned to a case that marks locative verbal adjuncts of Source. However, an ablative case may also be used to mark NPs in other functions, such as instrument, origin, comparison, and partitive (Blake 2001: 6, 34–35). In Afghan Wakhi, the enclitic *=n* 'ABL' is identical in form to the Possessive case enclitic; however, I analyze the Ablative as a separate case (a) because it attaches to a different stem for 1st and 2nd person pronouns, (b) because it is nearly always governed by a preposition, and (c) because its synchronic functions are distinct from those of the Possessive.

Examples of a 1SG pronoun inflected for Possessive and Ablative case are given in (96) and (97), respectively. As discussed in §3.1.3.6, the stem for the Possessive enclitic is the Genitive case form. However, the stem for the Ablative enclitic is the Default case form.

(96) *ðəwɟd* [*ʐɬ*] **=n** *tʊj.*
daughter 1SG=POSS COP
'I have a daughter.' (TEX-0023.094)

(97) *jɐn=i wəz-di pɐs* [*t͡sʊ* [*mɐzɟ*] **=ən**] *=i mɐzɐrɐt t͡ʃʲeld-i.*
then=3SG come-PST afterward from 1SG=ABL=3SG forgiveness want-PST
'Then afterward he came and sought forgiveness from me.' (21.11)

Unlike the Possessive, the Ablative is almost always governed by a preposition. One of the most common prepositions to govern the Ablative is *t͡sʊ* 'from'. This preposition never takes

its object in any case other than the Ablative. Prepositional phrases of the *t͡sʊ*+ABL type are usually used to mark a locative adjunct of Source (98) or a comparative construction (99).

(98) *ji pir spɔt͡sən tu [t͡sʊ [pɔkəstɔn]=ən*].
one pir 1PL.POSS COP.PST from Pakistan=ABL
'We had a pir [religious leader] from Pakistan.' (TEX-0310.05)

(99) [*t͡sʊ [zɻ sɐr]=ən] lup jɔ d͡zqlɐj?*
from 1SG.GEN head=ABL big or little
'Is it [a cantaloupe] bigger or smaller than my head?' (lit., 'From my head is it big or little?') (06.034)

Other prepositions may (but do not always) take an Ablative object. These prepositions include (but are not limited to) *skə* 'on' (100) with an origin function, *də* 'COM' (101) with a comitative function, and *pʊ* 'up to' (102) with an instrument function. When not governed by a preposition, an Ablative-marked NP usually has a partitive function (103), although it may occasionally be used without the expected preposition in one of its other functions (104).

(100) *jəm pɔtʃɔ=ən [sk=əm [xɔr kʊnd]=ən] bʊ tu ji pʊtr ʊt. . .*
PROX king=POSS on=PROX disfavored wife=ABL also COP.PST one son and
'This king had one son by his disfavored wife and . . .' (25.005)

(101) *jɐn=i wəz-di [də [mɐz̧]=ən]=i ɣɔlmɐɣɔl kər-ti.*
then=3SG come-PST COM 1SG=ABL=3SG argument do-PST
'Then he came and argued with me.' (21.06)

(102) *əm kɐ̧ əm=v=i [pʊ [ʃɐmʃir]=ən] əm=v=i kɨ dʊʃt, ʃit.*
PROX boy 3=PL.OBL=ACC up.to sword=ABL 3=PL.OBL=ACC all hit.3SG kill.3SG
'The boy strikes them all with the sword and kills them.' (25.254)

(103) *ɐ=[jiw]=ən=ə̧ ɐ=sɐr d͡ʒɨr=ən.*
EMPH=one=ABL=IPFV 3SG.DIST=head fixed=3PL
'One of them, they're making his head.' (TEX-0027.08)

(104) *wɔz bʊ tɐʃɐkər-i t͡sʊ sɐv=ən ki [sɐk]=ən=ə̧ xbɐr dərz-əv.*
DISC also thanks-NMLZ from 2PL.OBL=ABL COMP 1PL=ABL=IPFV news take-2PL
'So also thanks to you because you inquire about us.' (lit. 'So also thanks from you that you take news from us.') (TEX-0100.13)

3.1.3.8 Vocative Case

VOCATIVE is the case of direct address. Some linguists include the vocative as an "outlier" case (cf. Blake 2001: 8; Daniel & Spencer 2009: 627). However, others do not count vocative as a case because it does not serve a governed syntactic purpose within a clause (Iggesen 2013); rather, a vocative-marked NP stands outside a clause as an adjunct, usually coming either before or after a statement to gain the addressee's attention (Blake 2001: 8).

Afghan Wakhi has two different Vocative morphemes that can mark nominal NPs with a direct address function: the enclitic *=i* 'VOC', and the particle *e* 'VOC'. Although the Vocative enclitic is identical to the Accusative enclitic (cf. §3.1.3.3), I gloss it differently since it has a distinct function of direct address. The Vocative enclitic may attach to a proper name (105) or to a nominal NP (106), but not a pronoun. The Vocative particle is most commonly used before a Default-case NP (107), but it may also occur at the end of an utterance (108).

(105) [*mʊqɐdɐs*]***=i****!*
Moqadas=VOC
'O Moqadas!'[44]

(106) [*ʃɔgərd=v=i ɐziz*]*=v****=i****!*
student=PL.OBL=EZ dear=PL.OBL=VOC
'Dear students!' (literacy course observation)

(107) *çɐn-d:* ***e*** *nəpʊs, drəm wəzi.*
say-3SG VOC grandchild LOC.PROX come.2SG
'She says, "O grandchild, come here."' (TEX-0014.1-36)

(108) *tilɐ mɐʐ di,* ***e****!*
push 1SG hit.2SG VOC
'You're pushing me, hey!' (05.22)

[44] "Moqadas" is the Afghan name given to me by my first Dari teacher. Afghan Wakhi children frequently addressed me this way when they wanted me to play with them.

3.1.3.9 Differential Case Marking

Afghan Wakhi exhibits two different types of regular alternations in case marking: differential subject marking and differential object marking. DIFFERENTIAL SUBJECT MARKING (DSM) in Afghan Wakhi involves an alternation between the Nominative and Default cases; it affects only 1SG and 2SG (SAP) pronouns and is possible in every tense except the nonpast. Although an SAP pronominal subject is usually in the Nominative case form (109), the Default form of an SAP pronoun may also be used as a subject (110). As examples (109) – (110) demonstrate, DSM can affect subjects used with the same verb (*winɐk* 'to see'). Furthermore, DSM affects not only the subjects of transitive verbs like *winɐk*, but also the subjects of intransitive verbs such as *wəzɐjən* 'to come' (111) – (112). Although there is no explicit subject pronoun in (111), the subject is clear from the subject-indexing clitic *=əm* '1SG'. Subject-indexing clitics only index Nominative pronouns (cf. §3.5), so the only felicitous pronoun in this clause would be *wuz* '1SG.NOM'. I refer readers to SanGregory (2018) for additional examples and discussion of DSM (i.e., Default-marked subjects) in Afghan Wakhi, which I analyze as having an emphasis-marking function.

(109) ***tu*** *t͡ʃiz* *nʊ=win-ʊt-k=ɐ?*
2SG.NOM thing NEG=see-PRF-PRS=Q
'Haven't you seen anything?' (06.68)

(110) ***tɐw*** *bʊ* *pəlis=əv* *win-di.*
2SG also police=PL.OBL see-PST
'You also saw the police.' (10.07)

(111) *də* *wɐtɐn=**əm*** *ki* *wəz-di . . .*
LOC homeland=1SG COMP come-PST
'When I came home . . .' (TEX-0023.069)

(112) ***mɐz*** *ji* *rəwɔr* *wəz-di* *də* *bɔzɔr* *ki . . .*
1SG one day come-PST LOC bazaar COMP
'One day I came to the bazaar when . . .' (11.01)

Unlike DSM, which only affects SAP pronouns in tenses other than the nonpast, DIFFERENTIAL OBJECT MARKING (DOM) affects any NP functioning as a direct object in any tense. The two cases that alternate in DOM are the Default vs. the Accusative. Pairs of examples illustrating DOM can be seen in (113) – (118).

(113) *mʊʃt,* *ʐi̯* *tɐt* ***mɐʐ*** *duʃt!*
impossible 1SG.GEN father 1SG hit.3SG
'Impossible, my father hit me!' (03.64)

(114) *ɐw* ***mɐʐ=i*** *zɐr* *t͡sɐr-t.*
3SG.DIST 1SG=ACC injured do-3PL
'He will hurt me.' (25.078)

(115) *rʊt͡ʂ* *ɐ=****ji̯w*** *ʂkurg.*
go.2SG EMPH=cow search.2SG
'Go look for that cow.' (Wolf Attack 07)

(116) *əm* *ʂɐpt* *əm* ***ji̯w=i*** *lʊt͡sər-t.*
PROX wolf PROX cow=ACC leave-3SG
'The wolf leaves the cow.' (Wolf Attack 12)

(117) *ʐi̯* *tɐt=ər* *çɐn,*
1SG.GEN father=DAT say.2SG

ruji̯n *wʊzʊm-d.*
oil bring-3SG
'Tell my father (and) he'll bring oil.' (04.13)

(118) *wuz=əm* *ɐ=****ruji̯n=i*** *nʊ=ji̯r-ɔv-di.*
1SG.NOM=1SG EMPH=oil=ACC NEG=turn-CAUS-PST
'I didn't spill the oil.' (04.27)

Cross-linguistically, factors that commonly condition DOM include animacy, definiteness, and specificity (Malchukov & de Swart 2009: 345). The examples above show that DOM affects all direct objects regardless of their animacy: SAP (human) participants (examples (113) – (114)), non-human animates (examples (115) – (116)), and inanimates (examples (117) – (118)). This leaves specificity and definiteness as possibilities to investigate in future research.

3.1.3.10 Alignment

In Afghan Wakhi, subject-marking always follows a nominative-accusative pattern, regardless of whether the case used for the subject is Nominative or Default. In (119) and (120), the pronoun *wuz* '1SG.NOM' is used as the subject of an intransitive clause and of a transitive clause, respectively. Similarly, a Default-case pronoun ((121) and (122)) or nominal NP ((123) and (124)) can function as either an intransitive or transitive subject.

(119) NP_{SUBJ}
[***wuz***] *ɐmiʃɐ dʊ dɐrs rʊʧ͡ʂ-əm.*
1SG.NOM always LOC lesson go-1SG
'I always go to lessons.' (01.18)

(120) NP_{SUBJ}
[***wuz***] *jɐw=i wʊzm-əm tɐr.*
1SG.NOM 3SG=ACC bring-1SG 2SG.DAT
'I will bring it to you.' (23.04)

(121) NP_{SUBJ}
[***mɐʐ***] *də xun tu.*
1SG at house COP-PST
'I was at home.' (03.18)

(122) NP_{SUBJ} NP_{DO}
[***tɐw***] [*mɐʐ*] *win-di.*
2SG 1SG see-PST
'You saw me.' (20.04)

(123) NP_{SUBJ}
jɐn də ji sɔl [*ʐɨ* ***tɐt***] *bʊ mər-t . . .*
then LOC one year 1SG.GEN father also die-PST
'Then in one year both my father died . . .' (TEX-0023.078)

(124) NP_{SUBJ} NP_{DO}
[*jəm* ***tɐt***] [*əm=i*] *də məktɐb kɐr-ti.*
3SG.PROX father 3SG.PROX=ACC LOC school put-PST
'His father put him in school.' (TEX-0014-1.22)

As a result of DOM, case marking transitive clauses in Afghan Wakhi is split between neutral and nominative-accusative alignment patterns. In the neutral alignment, a direct object

receives the same marking as the subject. In other words, in a clause with neutral alignment, the direct object is in the Default case form, as seen above in (122). Neutral alignment is found in clauses where both arguments are pronouns (125) and where both are nominal NPs (126). It is also possible when either the subject (127) or the direct object (128) is an pronoun, and the other argument is a nominal NP.

(125) NP_{SUBJ} NP_{DO}
[*wuz*] = *əm* [*ɐw*] *jit-i.*
1SG.NOM=1SG 3SG eat-PST
'I ate it.' (25.427)

(126) NP_{SUBJ} NP_{DO}
[*kərzɻuptʃ͡*] *ji* *lɔj* [*çɨ* *sɐr*] *niçind.*
magpie one time self.GEN head pull.out.3SG
'The magpie will pull its head out one time.' (25.372)

(127) NP_{SUBJ} NP_{DO}
[*wuz*] = *əm* [*ji* *pərtʃ͡ɔd*] *xʊʃ* *kər-k.*
1SG.NOM=1SG one girl happy do-PRS
'I have liked a girl.' (TEX-0003.14)

(128) NP_{SUBJ} NP_{DO}
[*pɔtʃɔ*] [*sɐk*] *nʊ* = *lʊt͡sər-t.*
king 1PL.NOM NEG=leave-3SG
'The king won't allow us [to return].' (25.461)

Iranian languages are known for exhibiting various types of tense-sensitive alignment (TSA) patterns, i.e., nominative-accusative alignment in one part of the grammar and ergative-absolutive alignment in another based on tense and / or aspect (Haig 2008: 9). Afghan Wakhi presumably exhibited TSA sometime in the past (Payne 1980: 152). However, at present, no ergative alignment patterns remain. SAP pronominal subjects of intransitive and transitive predicates take the Nominative case form in the past and perfect tenses just as they do in the nonpast ((129) – (130)). All other types of NPs take Default marking when they function as subjects ((131) – (132)), regardless of the tense of the predicate.

(129) NP_{SUBJ}
[***wuz***] *=əm* *rəwɟ-di* *də* *dukɔn.*
1SG.NOM=1SG go-PST LOC store
'I went to the store.' (07.05)

(130) NP_{SUBJ} NP_{DO}
[***wuz***] *=əm* [*tɐw*] *də* *məktɐb* *rʊmʊt-i.*
1SG.NOM=1SG 2SG LOC school send-PST
'I sent you to school.' (01.01)

(131) NP_{SUBJ}
[***ʂɐpt***] *xiɐr* *tu-ʊt-k.*
wolf old be-PRF-PRS
'The wolf was old.' (Wolf Attack 17)

(132) NP_{SUBJ} NP_{DO}
[***ʂɐpt***] [*ji* *jɨw=i*] *wudg* *jit-k.*
wolf one cow=ACC today eat-PRS
'A wolf ate a cow today.' (Wolf Attack 10)

3.1.4 Specificity Marking

In addition to being inflected for number and case, NPs may be marked via the clitic *=i*, which I currently analyze as indicating the specificity of the referent and therefore gloss as 'SPEC'.[45] A specific NP is one whose identity the speaker has in mind, although the speaker does not assume the hearer is able to identify the intended referent. As such, specificity is just one member of an identifiability matrix that also includes definiteness and indefiniteness (Karimi 1989: 61–62; Langacker 1991: 103–104). As shown in Table 3.3, a speaker may choose to use a definite participant, specific participant, or indefinite participant based on whether they assume the intended referent is or is not identifiable to both speech act participants.

[45] Paul (2008) argues that a homophonous morpheme in Persian is not a specificity marker (among other things), but rather an individuating suffix. It would be worth following his methodology to further investigate the function of this suffix in Afghan Wakhi. However, at least one of his tests (using the individuating suffix alongside the Persian object marker) would not work since the specificity marker is identical to the ACC case suffix.

Table 3.3. Identifiability matrix*

	assumed to be identifiable to:	
	speaker	**hearer**
definite	+	+
specific	+	-
indefinite	-	-

* Based on Von Heusinger (2002: 249).

In Afghan Wakhi, nominals may be marked as specific regardless of their grammatical relation in a particular clause. For example, a subject, indirect object, and object of a preposition can be seen with this marking in (133) – (135), respectively.

(133) *jɐn=əm ki dʊʃ-t, [ʊt jupk]=**i** ˌjir-di.*
then=1SG COMP hit-PST MED water=SPEC spill-PST
'Then when I hit, that water spilled.' (19.04)

(134) *[ji xɐlg]=ər=**i** rʊt-i pʊl ʊt jʊt t͡ʃər-n ɐ=r=ʊt.*
one person=DAT=SPEC give-PST money and 3SG.MED enter-PST EMPH=down.to=MED
'(They) gave money to a [certain] person and he entered down into it [the toilet].' (TEX-0027.17)

(135) *tɐw=i bʊ [ʃɐrt]=**i** jund-əm*
2SG=ACC COM condition=SPEC carry-1SG

ki tu mɐr bɔz t͡ʃigɐsʊk=i tilɔ-i niˌsɔn rɐnd.
COMP 2SG.NOM 1SG.DAT then shelf=EZ gold-ADJ show give.2SG
'I will marry (lit., take) you on the condition that you show me the golden shelf.' (25.231)

The specificity enclitic is identical to the Accusative case marker (cf. §3.1.3.3). Therefore, when *=i* appears on a direct object (136), it could conceivably be either morpheme. Based on the homophony of the specificity and Accusative enclitics, I suspect that specificity may be a conditioning factor for Accusative case marking (i.e., differential object marking; §3.1.3.9) in Afghan Wakhi. In that situation, the specificity and Accusative markers may in fact be a single morpheme. The relationship between these two morphemes is a topic for future study.

In this dissertation, I gloss =*i* as the Accusative case marker when it attaches to a direct object and as the specificity marker elsewhere.

(136) *bɐz=i xɐlg=ən* [*dilbir*]**=*i*** *t͡ʃɐp kɐrt.*
some=EZ person=ABL yurt.roof=ACC left put.3SG
'Some people put the yurt roof felt on backwards.' (TEX-0253.20)

3.1.5 Interim Summary

As I have described in §3.1.2 – §3.1.4, Afghan Wakhi NPs may be inflected for number, case, and / or specificity. All three types of marking are enclitics that attach to the end of the NP. The same basic number and case enclitics are used on both nominal NPs and pronouns.

The Default plural enclitic =*ʃ* 'PL.DFLT' never co-occurs with any other NP-level enclitic. Aside from that, number, case, and specificity enclitics may co-occur on the same NP in a specific order. The oblique plural enclitic =*v* 'PL.OBL' attaches directly to the final word of the NP, followed by a case-marking enclitic (137). The specificity enclitic =*i* 'SPEC' follows the case marker (138). Table 3.4 displays the morphological template for nominal NPs and 3SG pronouns. The numbers in the first line of the table refer to morphological positions relative to the stem (or final word of a complex nominal NP).

(137) *tu rʊt͡ʂ* [*jɐ çɨ mɔl*]**=*v*=*i*** *ðit͡s.*
2SG.NOM go.2SG DIST self.GEN livestock=PL.OBL=ACC milk.2SG
'Go milk those flocks of yours.' (03.01)

(138) [*ji xɐlg*]**=*ər*=*i*** *rʊt-i pul ʊt t͡ʃər-n ɐ=rʊt.*
one person=DAT=SPEC give-PST money and enter-PST EMPH=down.to.3SG.MED
'He gave money to a certain person and entered into it [the toilet].' (TEX-0027.17)

Table 3.4. Morphological template for nominal NPs and 3SG pronouns

0 STEM	+1 (NUM)	+2 (CASE)	+3 (SPECIFICITY)
		=*ʃ* 'PL.DFLT'	
	=*v* 'PL.OBL'	=*i* 'ACC'; 'VOC'	=*i* 'SPEC'
		=*r* 'DAT'	
		=*n* 'POSS'; 'ABL'	

Pronouns, particularly those for speech act participants (1SG and 2SG), exhibit a number of suppletive forms that do not necessarily follow predictable patterns. Case paradigms for SAP pronouns are displayed in Table 3.5. A full pronominal paradigm for all persons and numbers is given in Table 3.6 and Table 3.7 in §3.3.2.

Table 3.5. Case paradigm for SAP pronouns

	NOM	DFLT	ACC	DAT	GEN	POSS	ABL
1SG	*wuz*	*mɐʐ*	*mɐʐi*	*mɐr(ʊk)*	*ʐi*	*ʐin(ən)*	*mɐʐən*
2SG	*tu*	*tɐw*	*tɐwi*	*tɐr(ʊk)*	*ti*	*tin(ən)*	*tɐwən*

3.2. Nouns

Afghan Wakhi has a large open class of nouns. Nouns in Afghan Wakhi can be identified by their shared morphological and syntactic characteristics. These characteristics include derivational morphology, ability to be modified by words from certain classes, ability to be modified by relative clauses, ability to function as any argument of a predicate (subject, object, indirect object), ability to function as object of a preposition, and mutual substitutability with multi-word noun phrases.

3.2.1 Noun Derivation

In Afghan Wakhi, the class of nouns can be augmented by nouns derived from other lexical categories. Morphological strategies for deriving nouns from other words include the

nominalizing suffix *-ɨj*, the infinitival suffix *-ɐk ~ -ʊk*, and the perfect suffix *-g ~ -k*. Other nouns are formed by compounding, while still others are formed by coercing adjectives to function as substantive nouns.

3.2.1.1 Standard Nominalization

One of the most common derivational morphemes used to create nouns in Afghan Wakhi is *-ɨj*. This suffix productively derives nouns from other nouns, adjectives, and verbs. The suffix *-ɨj* can attach to a noun that is a word for a profession, such as *mɐlim* 'teacher'. The result of the derivational process is a derived noun that names the activity such a person engages in, such as *mɐlim-ɨj* 'teaching' (139). When an adjective is nominalized with *-ɨj*, the derived noun generally refers to the state or condition characterized by the property that the adjective describes, as shown in (140). When used to derive a noun from a verb, the suffix *-ɨj* attaches to the perfect participle (formed with *-k ~ -g*) and produces a resultative noun, such as the one seen in (141). Example (141) also demonstrates that a noun derived via *-ɨj* can be inflected with regular NP-level morphology, such as the enclitics for plural number and case. This nominalizing suffix may be reduced to *-i*, as illustrated by (142).

(139) *jʊt* ***mɐlim-ɨj=əm*** *bʊ* *kər-ti* *ʊt̪.*
MED teacher-NMLZ=1SG also do-PST open
'I also quit the teaching [job].' (TEX-0023.075)

(140) *də* ***gɐrm-ɨj*** *jɐw* *jɐw-ən.*
LOC warm-NMLZ 3SG.DIST eat-3PL
'They eat it in the heat' (i.e., when the weather is warm). (06.012)

(141) *wɔz* *wuz=əm* *jʊt* *mʊʃqɔb* ***s̪kən-g-ɨj=v=i*** *d͡ʒɐm* *kər-ti.*
then 1SG.NOM=1SG MED plate break-PRS-NMLZ=PL.OBL=ACC gathered do-PST
'Then I gathered the plate's broken pieces.' (08.08)

(142) ***məktɐb-i=əm*** *tʊj,* *ɔ.*
school-NMLZ=1SG COP yes
'I'm a student, yes.' (06.05)

3.2.1.2 Infinitival Nominalization

In Afghan Wakhi, verbs that have been derived into their infinitival form function as nouns. Infinitives are most commonly formed from the nonpast verb stem plus the regular infinitive suffix *-ʊk ~ -ɐk*, as shown in (143),[46] but some verbs have suppletive infinitive forms, such as the one given in (144).

(143) *xɐj wuz ti tɐt=ər* ***çən-ɐk*** *nʊ=bɐs wəzi-əm.*
INTJ 1SG.NOM 2SG.GEN father=DAT say-INF NEG=enough come-1SG
'Well, I am unable to tell your father.' (04.24)

(144) *sɐk jɐw=i tɐr* ***t͡sət͡sɔxt rədɔw*** *bɐs wəzi-ən?*
1PL.NOM 3SG.DIST=ACC 2SG.DAT how give.INF enough come-1PL
'How are we able to give her to you?' (TEX-0014.52)

Infinitives can also be derived using the suffix *-ən*, as shown in (145). Although this suffix is used less frequently than *-ʊk ~ -ɐk*, it is available as an alternate infinitive-forming strategy for most verbs. For example, an infinitive of the verb meaning 'read' takes *-ʊk* in (146) but *-ən* in (147).

(145) *tɐw skə* ***niw-ən*** *vit-i.*
2SG on cry-INF become-PST
'You started crying.' (lit., 'You became on crying.') (22.13)

(146) *bʊt məktɐb* ***d͡ʒɔj-ʊk*** *nʊ=bas wəzi-əm.*
also school read-INF NEG=enough come-1SG
'I also won't be able to study at school (lit., read school).' (02.46)

(147) *ʂəwʝd* ***d͡ʒɔj-ən-kɨzg=əv*** *kitɔb skə çik zik*
new read-INF-AGT=PL.OBL book on Wakhi language
'New Readers' Book on the Wakhi Language' (Primer title)

The syntactic functions, modification possibilities, and stress patterns of infinitives provide evidence for their membership in the category of nouns. An infinitive may function as

[46] Sometimes the choice between *-ʊk* and *-ɐk* seems to be phonologically conditioned, but sometimes the two suffixes are in free variation even for the same speaker.

the head of an NP that is a syntactic subject as in (148) and (149), or the object of a preposition as in (150). Example (149) also shows that an infinitive may be modified by an adnominal possessor.

(148) *xʊj,* ***rətʂ-ʊk*** *tɐr ɣɐl mʊʃkɪl.*
INTJ go-INF 2SG.DAT still difficult
'Going is still [too] difficult for you.'

(149) *ʂəriʂ* ***wʊdər-ɐk=i*** *wɔdɐr-ti.*
glue hold-INF=SPEC hold-PST
'The glue's hold held.' (07.17)

(150) *ɐw* *t͡ʃilgɐzmɐk=i* *t͡sʊ* ***jɪn-ʊk=ən*** *giz-ʊv-d.*
3SG.DIST forty.meter.neck=ACC from sleep-INF=ABL rise-CAUS-3SG
'It will wake up the Forty-Meter-Necked Lady from sleeping.' (25.373)

As I describe in §2.3.2, most word classes, including nouns, exhibit stem-final stress. Although verb words exhibit stem-initial stress, infinitives bear stem-final stress, as shown in the inflected vs. infinitival forms of the verb meaning 'go', displayed in (151). This stem-final stress pattern is further evidence that infinitives belong to the class of nouns.

(151) *ˈrʊtʂ-əm* → *rʊtʂ-ˈɐk*
go-1SG go-INF
'I am going' 'to go'

3.2.1.3 Agent Nominalization

The suffix *-kɨzg* is used to derive an infinitive into a person who performs the activity denoted by that infinitive. I therefore gloss this suffix as 'AGT.' The agent derivational suffix can attach to any infinitive regardless of the form of the infinitive suffix used *(-ən* or *-ɐk*). The resulting word is a noun, as shown in (152); however, an agent-derived noun may modify

another noun, as in (153). Note that (153) is formed from the light verb construction (LVC) *jɐrk t͡sərɐk* 'to work,' demonstrating that LVCs as well as simple verbs may be derived into agents.[47]

(152) *ʂəwʝd* ***d͡ʒɔj-ən-kɨzg=əv*** *kitɔb skə çik zik*
new read-INF-AGT=PL.OBL book on Wakhi language
'New Readers' Book on the Wakhi Language' (Primer title)

(153) *bi-kɔr xur wəz-g,*
PRIV-work donkey come-PRS

jɐrk-t͡sər-ɐk-kɨzg[48] *xur=i t͡sʊ jɐrk=ən niçit-k.*
work-do-INF-AGT donkey=ACC from work=ABL pull.out-PRS
'An unemployed donkey has come and pulled the hardworking donkey away from work.'
(Wakhi proverb)

3.2.1.4 Perfect Participial Nominalization

Perfect participles, which are formed with the stem-forming perfect suffix *-g ~ -k* (cf. §4.5.1.1), also exhibit stem-final stress. An example of an inflected verb with initial stress, compared to the perfect participle of the same verb with final stress, can be seen in (154).

(154) *ˈwʊ.rəf.s-əm* → *wʊ.rəfˈs-ʊt-k*
stand-1SG stand-PRF-PRS
'I stand up' 'has stood; standing'

Although perfect participles may function as clausal predicates (155) (cf. §4.5.1), they can also perform functions typically held by other word classes. Most relevant for the current chapter, a perfect participle may serve as the head of a NP that functions as a syntactic argument. For example, (156) contains two perfect participles, the first of which serves as the object of a preposition, and the second of which heads an NP functioning as the direct object of its clause. In addition, the perfect participle in the final clause of (156) is modified by an adnominal possessor (*ɐw* '3SG.DIST'), as other nouns may be.

[47] See Chapter 6 for a discussion of light verb constructions in Wakhi.

[48] Note that in actual speech, the /*kk*/ of the infinitive + agent suffixes simplifies to [k], i.e., *jɐrkt͡sərɐkizg*.

(155) *mɐlim tɐr* ***fɐnd-ʊt-k***.
teacher 2SG.DAT lie-PRF-PRS
'The teacher has lied to you.' (01.04)

(156) *nʊ də* ***kɨn-g*** *diʃ-t ʊt,*
NEG LOC pluck-PRS know-3SG and

nʊ ɐw vər=əʂ diʃ-t ʊt,
NEG 3SG.DIST load=IPFV know-3SG and

nʊ ɐw bərɔdɐr=i gʊl ***di-n-g*** *diʃ-t.*
NEG 3SG.DIST brother=EZ flower hit-PRF-PRS know-3SG
'Neither does he know how to take it [a yurt] down, nor does he know its loading, nor brother dear does he know its putting up.' (TEX-0118.43)[49]

3.2.1.5 Compounding

Another way to form nouns is via compounding. Two nouns (157), or a number and a noun (158), may be compounded together to form a new noun.

(157) *t͡s=ʊt=ən əm ʃurɐwi* ***t͡ʃɐrx-bɔl=əʃ*** *sɐk dəʐ-d jut.*
from=MED=ABL PROX Russian wheel-wing=PL.DFLT 1PL.NOM take-PST carry.PST
'Taking us from there, the Russians' helicopters (lit., 'wheel-wings') carried us.' (TEX-0023.038)

(158) ***t͡ʃɔr-xɔnɐ*** *jʊt=ər çɐn-ən.*
four-house MED=DAT say-1PL
'We call that a skylight window frame (lit., 'four-house').' (TEX-0096.26)

3.2.1.6 Coercion (Conversion)

Although new nouns are derived primarily through the use of morphology, it is possible to use an adjective as a noun without any derivational morphology.[50] An adjective that is coerced into being a noun typically refers to an entity characterized by the property that the adjective describes, and may be translated as 'an X-one' or 'a Y-thing'. An adjectival noun may be the

[49] The word *gʊl* 'flower' functions as a term of endearment when it follows a name or kinship term.

[50] See §3.4.1 for a description of adjective phrases.

head of an uninflected NP, as seen in (159), or it may serve as the head of an NP inflected for case (160) or number (161).

(159) ***lup*** *bʊ* *tʊj* *ʊt* ***d͡zəqlɐj*** *bʊ* *tʊj.*[51]
big also COP and little also COP
'There are big (ones) and there are also little (ones).' (06.035)

(160) *zɪndɐ-gi* *kudɐk=ər,* *jɔ* ***d͡ʒəwɔn=ər*** *ʊt͡ʃ* *t͡ʃiz* *nɐst.*
alive-NMLZ young.child=DAT or young=DAT none thing COP.NEG
'To children, or to youths, life is nothing.' (02.34)

(161) *ɐ=**sʊkr**=əʃ* *sib=ɐ?*
EMPH=red=PL.DFLT apple=Q
'Those red (things) are apples?' (06.061)

3.3. Pronouns

Afghan Wakhi has a fairly large inventory of pronouns that, like other NPs, function as referring expressions. In this section, I provide an overview of these pronouns, including demonstrative pronouns, personal pronouns, reflexive pronouns, the reciprocal pronoun, the relative pronoun, and interrogative pronouns and other question words.

3.3.1 Demonstrative Pronouns

Wakhi has a basic set of three demonstrative pronouns that differ in terms of deixis based on proximity to the deictic center, i.e., the speaker: *jəm* 'PROX' (proximal, i.e., 'this'), *jʊt* 'MED' (medial, i.e., 'that'), and *jɐw* 'DIST' (distal, i.e., 'that (far)'). Besides serving as deictic demonstrative pronouns (162), these pronouns can also function as demonstrative determiners (163) and definite determiners (164).

[51] This sentence is an example of an existential construction. For a more detailed description of existential clauses, see §5.2.2.4.

(162) *ɐ=jəm pərindɐ wɔz ʦ͡=əm çɨ ʂɐfʂ=ən jəm=ər rʊt-k*
EMPH=PROX bird then from=3SG.PROX self.GEN hair=ABL 3SG.PROX=DAT give-PRS

*jiw ki: **jəm=i** tər suz wʊdər.*
one COMP PROX=ACC over.to burning hold.2SG
'The bird then gives him one of its hairs [i.e., feathers] (saying) that: 'Hold this in the fire."' (25.435-436)

(163) ***jəm** muʃqɔb ʦ͡ʊ zʲɨ kɐf=ən wɐʂ-ti, ʂkən-i.*
PROX plate from 1SG.GEN palm=ABL fall-PST break-PST
'This plate fell from my hand and broke.' (07.14)

(164) ***jəm** pɐri **jəm** kɐʂ çɐn-d ki. . .*
PROX fairy PROX boy say-3SG COMP
'The fairy says to the boy. . .' (25.145)

The demonstrative pronouns are frequently reduced in fluent speech. The proximal demonstrative *jəm* reduces to *əm* (165); the medial demonstrative *jʊt* reduces to *ʊt* (166); and the distal demonstrative *jɐw* reduces to *jɐ* or *ɐw* (167), and sometimes even to *ɐ* when cliticized to a preposition (168).

(165) *tu ʧ͡ʃəkɔrɐ ʊmi ki mɐrək **əm** ʤ͡zi gɐp di?*
2SG.NOM what COP.SBJV.2SG COMP 1SG.DAT PROX like.this chat hit.2SG
'What might you be that you talk to me like this?' (25.123)

(166) *ɐr kuj diʃ-t **ʊt** çɨ dɐrd.*
all who know-3SG MED self.GEN pain
'Everyone knows their own pain.' (lit., 'Everyone knows that their pain.') (Wakhi proverb)

(167) *wuz ɐ=**jɐ** ʧ͡ʃiz ʂkurg-əm*
1SG.NOM EMPH=DIST thing search-1SG

*ki tɐw **ɐw** mɔʃ-ti ʦ͡ʊj.*
COMP 2SG 3SG.DIST hide-PST COP.SBJV
'I am searching for that thing that you hid.' (22.11)

(168) *ɐn=ən ʦ͡=**ɐ**=n ɣɐfʧ͡ʃ wʊʂ-ti.*
then=1PL from=DIST=ABL INTS fear-PST
'Then we were very afraid of it.' (Bear Encounter 04)

3.3.2 Personal Pronouns

Personal pronouns in Afghan Wakhi are differentiated for three persons (first, second, and third person) and two numbers (singular and plural). There is no dedicated third person pronoun; instead, all three of the demonstrative pronouns (cf. §3.3.1) also function as third person pronouns, as seen in (169) – (171).[52] The form chosen may have discourse and / or participant tracking functions in addition to deictic functions, but a full discourse analysis study is needed to determine what these functions may be. When glossing third person pronouns, I include deixis, e.g., *jəm* '3SG.PROX' or *jɐ=v=i* '3.DIST=PL.OBL=ACC'.

(169) ***jəm*** *rʊʂt* *ɐ=d͡ʒingɐl.*
3SG.PROX go.3SG EMPH=forest
'He goes to the forest.' (Wolf Attack 8)

(170) *ji* *bɐf* *bʊt͡ʃ* *ʐi=n* *tu,* ***jʊt*** *mər-t.*
one good uncle 1SG=POSS COP.PST 3SG.MED die-PST
'I had a good uncle, (and) he died.' (TEX-0023.080)

(171) *bɐd=i* *jʊt* *wɔz* ***jɐw*** *bʊ* *tɐsmim* *wɔdɐr-t* *qbɨl=i* *kər-ti.*
subsequent=EZ MED then 3SG.DIST also decision grasp-PST acceptance=3SG do-PST
'After that then she also decided and accepted [my proposal].' (TEX-0003.11)

Personal pronouns inflect for the same cases as nominal NPs (cf. §3.1.3), with the exception of the Vocative, which is not found on pronouns. Full paradigms of the personal pronouns are found in Table 3.6 and Table 3.7. Since the demonstrative pronouns also function as third person pronouns, they are included in these tables. Like nominal NPs (§3.1.3.1), 3SG pronouns that are not inflected for case can serve several syntactic functions (subject, object, adnominal possessor), with the appropriate function determined by syntax. For this reason, I consider uninflected 3SG pronouns to be Default, and I do not gloss them for case.

[52] Afghan Wakhi is not unique in this respect. In a survey of 225 languages, 33 languages were found to use all of the available demonstratives for the third person pronoun (Bhat 2013).

Table 3.6. Pronominal case forms

	Nominative			Default			Accusative			Dative		
person	**1**	**2**	**3**	**1**	**2**	**3**	**1**	**2**	**3**	**1**	**2**	**3**
SG	*wuz*	*tu*	---	*mɐʐ*	*tɐw*	*jəm*	*mɐʐi*	*tɐwi*	*jəmi*	*mɐr*	*tɐr*	*jəmər*
			---			*jʊt*			*jʊti*			*jʊtər*
			---			*jɐw*			*jɐwi*			*jɐr*
PL	*sɐk*	*sɐjəʃ*	---	---	*sɐv*	*jəməʃ*	*sɐki*	*sɐvi*	*jəmvi*	*sɐkər*	*sɐvər*	*jəmvər*
			---			*jʊtəʃ*			*jʊtvi*			*jʊtvər*
			---			*jɐwəʃ*			*jɐvi*			*jɐvər*

Table 3.7. Pronominal case forms, cont.

	Genitive			Possessive			Ablative		
person	**1**	**2**	**3**	**1**	**2**	**3**	**1**	**2**	**3**
SG	*ʐɨ*	*ti*	*jəm*	*ʐɨn,*	*tin,*	*jəmən*	*mɐʐən*	*tɐwən*	*jəmən*
			jʊt	*ʐɨnən*	*tinən*	*jʊtən*			*jʊtən*
			jɐw			*jɐwən*			*jɐwən*
PL	*spɔ*	*sɐv*	*jɐv*	*spɔ͡tsən*	*sɐvən*	*jəmvən*	*sɐkən*	*sɐvən*	*jəmvən*
						jʊtvən			*jʊtvən*
						jɐvən			*jɐvən*

3.3.3 Reflexive Pronouns

In Afghan Wakhi, the pronoun *çɐt* functions as both a reflexive and as an emphatic; its function can be determined based on the construction in which it occurs. I gloss this pronoun as 'self' regardless of its function in a particular clause; I also refer to it generically as the reflexive except when specifically highlighting its emphatic function. The reflexive pronoun has a Default case form but not a Nominative form, as seen from the different stems used for the Possessive and Ablative cases. Otherwise, the reflexive pronoun can occur in every case except Vocative. Unlike other pronouns, the reflexive pronoun cannot be marked for number. A full case paradigm for the reflexive pronoun is given in Table 3.8.

Table 3.8. Reflexive and emphatic pronouns

DFLT	ACC	DAT	GEN	POSS	ABL
çɐt	*çɐti*	*çɐtər*	*çɨ*	*çɨn*	*çɐtən*

A reflexive pronoun is an anaphoric pronoun that is coreferential with an antecedent functioning as the grammatical subject of the same minimal clause, regardless of whether that clause is intransitive (172) or transitive (173). A reflexive pronoun is also used instead of a personal pronoun when its antecedent is an elided subject, as long as that subject is the participant referred to most recently in the preceding discourse context. An example of this use of the reflexive can be seen in (174), where the Genitive form of the reflexive in the final clause is coreferential with an unmentioned 1SG subject.

(172) *jəm* *ki* *wɔz* *nɨwʊz-d,*
3SG.PROX COMP again come.out-3SG

sɐk *çɐt* *bɨn-ən.*
1PL.NOM$_j$ self$_j$ knock.down-1PL
'When it [the bear] comes out again, we throw ourselves down.' (TEX-0130.18)

(173) *ɐw* *tɐw* *pʊ* ***çɨ*** *pɐr* *trɐn$\widehat{dʒ}$-d.*
3SG.DIST$_i$ 2SG$_j$ up.to self.GEN$_i$ wing hug-3SG
'She will hug you with her wings.' (25.278)

(174) *tu* *ɐgɐr* *mɐrək* *kʊnd* *$\widehat{tsʊ}$* *rɐnd,*
2SG.NOM if 1SG.DAT wife SBJV give.2SG

wʊz *jɐn* *$\widehat{tsʊ}$* *məktɐb=ən* *wʊrʊ$\widehat{tʂ}$-əm,*
1SG.NOM$_j$ then from school=ABL remain-1SG

jɐn *$\widehat{tsʊ}$* ***çɨ*** *dɐrs=ən* *wʊrʊ$\widehat{tʂ}$-əm.*
then from self.GEN$_j$ lesson=ABL remain-1SG
'If you give me a wife, then I will be left behind from school; then I'll be left behind from my lessons.' (02.22)

When the antecedent of a reflexive is unambiguously the subject of the same minimal clause, speakers strongly disprefer using the corresponding personal pronoun in its place. For

example, consider (175) – (177). The pronoun *jəm=ən* '3SG.PROX=POSS' in (175) is coreferential with the unexpressed subject in (176), which in turn is the antecedent of the reflexive pronoun found in the same clause. Substituting the pronoun *jɐw=ən* '3SG.DIST=ABL' for the reflexive pronoun in (176) produces the infelicitous utterance given in (177). The only possible grammatical reading of (177) is one in which the Ablative pronoun has a different antecedent from the subject of the clause.

(175) *ji xɐnduni jəm=ən tu.*
one puppy 3SG.PROX=POSS$_i$ COP.PST
'He [the king's disfavored son] had a puppy.' (25.056)

(176) ∅ *jəm=i də* ***çɐt=ən*** *jut-i.*
∅$_i$ 3SG.PROX=ACC COM self=ABL$_i$ take-PST
'He took it with himself.' (25.057)

(177) *jəm=i də* ***jɐw=ən*** *jut-i.*
3SG.PROX=ACC COM self=ABL take-PST
'He$_i$ took it with him$_j$.'
(not: *'He$_i$ took it with him$_i$.')

In imperatives, a reflexive pronoun is typically taken to be coreferential with the addressee unless another antecedent is more salient. For example, in (178), the Genitive reflexive pronoun refers to the understood 2SG addressee of the imperative clause.

(178) *jɐw ki sɐdɔ kər-ti,*
3SG.DIST COMP sound do-PST

çi *sɐr ji ləj prʊt* *t͡sɐr.*
self.GEN head one time forward do.2SG
'When it [the magpie] calls, put your head forward one time.' (25.305)

When used immediately following a personal pronoun, the uninflected (Default) form of the reflexive serves as an emphatic pronoun. The emphatic pronoun may be used once for mild intensification, as seen in (179), or it may be repeated to strengthen the intensification even

further, as in(180).[53] I gloss a reflexive pronoun used as an emphatic as 'self.EMPH' to make the emphatic function clear.

(179) *ɐslɐn tu **çɐt** tə xun nɐg nʊ=rʊç-k.*
surely 2SG.NOM self.EMPH to house direction NEG=go-PRS
'Surely you yourself haven't gone up to the house.' (03.35)

(180) *nʊj, tu=ʂ **çɐt** **çɐt** wɐʂ-ti.*
no 2SG.NOM=IPFV self.EMPH self.EMPH fall-PST
'No, you were falling all by yourself.' (05.23)

3.3.4 Reciprocal Pronoun

Wakhi has a unique pronoun *jɔmɐn* that functions as a reciprocal that essentially means 'each other'. The reciprocal pronoun may be inflected for Accusative, Dative, or Possessive / Ablative case (the Possessive and Ablative forms are syncretic). The case forms of the reciprocal pronoun are given in Table 3.9.

Table 3.9. Forms of the reciprocal pronoun

NOM	ACC	DAT	POSS / ABL
jɔmɐn	*jɔmɐni*	*jɔmɐnər*	*jɔmɐnən*

The reciprocal pronoun may be used to refer to 1PL, 2PL, or 3PL referents, as seen in (181) – (183), respectively. These examples also show that the reciprocal pronoun is inflected for case according to the syntactic function or semantic role it plays in the clause.

(181) *sɐk **jɔmɐn=ər** ɐ=d=ʊt wɐxt tru rəwɔr ɔʃ=i ʃərik-i*
1PL.NOM RECIP=DAT EMPH=LOC=MED time three day aash=EZ share-ADJ

t͡s=əm xun=i ɔrɔm=v=ən wʊzm-ən.
from=PROX house=EZ peaceful=PL.OBL=ABL bring-1PL
'At that time, for three days we bring each other shared aash [noodle soup] from peaceful homes.' (TEX-0285.06)

[53] This use of repetition to increase the strength of an utterance is a classic feature of expressive meaning as opposed to descriptive meaning (Potts 2007: 182–183).

(182) *zimistɔn bʊ sɨr, ti d͡ʒɔgɐ bʊ ʃundr, gɐrm də* ***jɔmɐn=ən.***
winter also cold 2SG.GEN bed also warm warm COM RECIP=ABL
'Winter is cold, (but) your bed is warm, (you) are warm with each other.' (02.39)

(183) *krɔʂ kɐm=i fɐrq t͡sʊ* ***jɔmɐn=ən.***
vetch little=EZ difference from RECIP=ABL
'Vetches have some differences from each other.' (TEX-0175.11)[54]

3.3.5 Interrogative Pronouns and Other Question Words

Afghan Wakhi has a number of question words, many of which are interrogative pronouns, while others function as interrogative adjectives or adverbs. In this section, I list and describe the meaning and use of all question words. The interrogatives and their glosses are displayed in Table 3.10, which is organized by formal similarities. In the following sections, I discuss and provide examples of each interrogative in use.

Table 3.10. Interrogative pronouns and adverbs

interrogative	gloss
kuj	'who, whose'
ki	'who, whose'
kum	'which, which one'
kumr	'where'
t͡ʃiz	'what'
t͡ʃizr	'why'
t͡ʃəkɔrɐ	'what'
t͡sət͡sɔxt	'how, what kind'
t͡sərəng	'how'
t͡sʊrək	'why'
t͡sum	'how many, how much'
t͡sɔɣdr	'when'

[54] Vetches are members of the legume family. The Afghan Wakhi cultivate two different varieties of vetches, which they use primarily as fodder for livestock.

3.3.5.1 kuj 'who / whose?'

The interrogative pronoun *kuj* means 'who?' In its uninflected form, this pronoun may be used to question the subject or object of a sentence, as in (184) and (185), respectively.

(184) *bəndɐ=i xɔk-i=r tumr id͡ʒɔzɐ **kuj** rɐnd*
slave=EZ dust-ADJ=DAT this.much permission who give.3SG

ki ɐw wizit dr=əm?
COMP 3SG.DIST come.3SG LOC=PROX
'Who gives a person of dust this much permission that he comes up here?' (25.086)

(185) *xub, xɐj, tu **kuj** jun-d?*
good INTJ 2SG.NOM who carry-3SG
'Well, okay, whom will you take (i.e., marry)?' (02.26)

The pronoun *kuj* may also function as an indefinite pronoun meaning 'whoever' or 'anyone'. When functioning as this type of indefinite pronoun, *kuj* is always in a construction with a modifying relative clause, as seen in (186). With the addition of the quantifiers *ʊt͡ʃ* 'none' or *ɐr* 'all,' *kuj* functions as the indefinite pronouns meaning 'no one' (187) and 'everyone' (188), respectively.

(186) ***kuj** ki pɔmir rɐw aw=i diʃ-t.*
who COMP Pamir goer 3SG.DIST=ACC know-3SG
'Whoever / anyone who is a Pamir-goer knows it.' (TEX-0118.21)

(187) *də xun=i ʃɐxs-i t͡s=əm=ən **ʊt͡ʃ** **kuj** istifɔdɐ nʊ=t͡sɐr-t.*
LOC house=EZ person-ADJ from=3SG.PROX=ABL none who use NEG=do-3SG
'In personal homes, no one uses (anything) from it.' (TEX-0310.12)

(188) *ɐr **kuj** diʃ-t ʊt çɨ dɐrd.*
all who know-3SG MED self.GEN pain
'Everyone knows their own pain.' (Wakhi proverb)

3.3.5.2 ki 'who / whose?'

In addition to *kuj*, Afghan Wakhi also sometimes uses the interrogative pronoun *ki*, which is borrowed from Dari. This pronoun is usually unmarked for case regardless of which

constituent it questions. For example, it is used to question the subject of a clause in (189) and an adnominal possessor in (190).

(189) *t͡ʃigɐsʊk=i tilɔ-i **ki** wɔzɔm-di?'*
shelf=EZ gold-ADJ who bring-PST
'Who brought the golden shelf?' (25.577)

(190) *t͡ʃigɐsʊk=i tilɔ-i tɐ=r mɐlɨm tʊj=ɐ,*
shelf=EZ gold-ADJ 2SG=DAT apparent COP=Q

*ɐw **ki** kɐf?*
3SG.DIST whose palm
'Is the golden shelf apparent to you, (in) whose hand it (is)?' (25.208)

The interrogative pronoun *ki* may be inflected with the Possessive case marker *=n*. With Possessive case marking, the resulting clause is an interrogative possessive clause, as seen in (191). For more information about possessive clauses and other nonverbal predicate constructions, see Chapter 5.

(191) *jɐʃ **ki=n** tʊj?*
horse who=POSS COP
'Who has the horse?'

3.3.5.3 kum 'which one?'

The interrogative *kum* means 'which / which one?' in Afghan Wakhi. It can function as either a determiner or a pronoun depending on the particular construction in which it occurs. This interrogative may be used to question a variety of constituents in the clause. For example, in (192) it is used to question the possessee of a possessive clause, and in (193) it questions the object of a preposition; in both examples, it functions as a determiner.

(192) *ti=nən **kum** diɔr=əv zɐrurɐt=i*
2SG=POSS which village=PL.OBL need=SPEC

ki wuz bɔjɐd ɐ=dɐ diɔr rʊ͡ʃ-əm?
COMP 1SG.NOM should EMPH=LOC village go-1SG
'Which needy villages do you have that I should go to that village?' (TEX-0306-2.14)

(193) *tər* ***kum*** *nɐg* *ʊt* *ˌjuz* *tu?*
over.to which direction MED firewood COP.PST
'Over in which direction was that firewood?' (05.01)

The question word *kum* is frequently used in construction with the word *d͡ʒɐj* 'place' to form the adverbial question 'where?' (lit., 'which place?'). An example of *kum d͡ʒɐj* can be seen in (194). Even without *d͡ʒɐj*, *kum* may function to question a location, particularly when it is part of an Ablative construction of Source, as seen in (195). The Ablative case marking in (195) is evidence that *kum* functions as a pronoun in this example. At this point in time, I have no evidence that *kum* can take any case marking other than the Ablative.

(194) *ɐw* *ki* *kɐf;* *ɐw* ***kum*** ***d͡ʒɐj****?*
3SG.DIST whose palm 3SG.DIST which place
'Who has it; where is it?' (25.232)

(195) *jəm* *mɐwɔd* *t͡sʊ* ***kum=ən*** *wɔz?*
3SG.PROX materials from which=ABL then
'Where do its materials come from then?' (TEX-0059.13)

3.3.5.4 kumr 'where?'

In addition to the phrase *kum d͡ʒɐj* (cf. §3.3.5.3), the interrogative *kumr* also means 'where?' in Afghan Wakhi. An example using this question word is given in (196). This word may have evolved diachronically from inflecting the interrogative *kum* 'which?' with the Dative suffix *=r*. This path of development could have been facilitated by speakers' use of *kum* to question location without the accompanying word *d͡ʒɐj* 'place', as shown in (195). However, in synchronic usage, speakers do not seem to be aware of the possible internal structure of this word. Therefore, I treat *kumr* as a monomorphemic word meaning 'where?' rather than parsing and glossing its constituent morphemes.

(196) *xɐj* *ɐ=ʒɐrʒ* *jɐn* *niv* ***kumr****?*
INTJ EMPH=milk then now where
'Well then, where is the milk now?' (03.13)

3.3.5.5 t͡ʃiz 'what?'

The interrogative pronoun meaning 'what?' is *t͡ʃiz* (197). This pronoun is usually not inflected for case, although it may take the Ablative case in certain constructions, such as the comparative construction seen in (198).

(197) *tu=ʂ* ***t͡ʃiz*** *gɔç?*
2SG.NOM=IPFV what do-3SG
'What are you doing?' (TEX-0014-1.37)

(198) *ʂtər t͡sʊ* ***t͡ʃiz=ən,*** *t͡sʊ d͡zuʝ=ən jilɐ qɐd bəlɐnd.*
camel from what=ABL from yak=ABL a.little height tall
'Compared to what, compared to yaks camels are a little taller.' (lit., 'Camels from what, from yaks (are) a little taller.') (01.34)

The word *t͡ʃiz* also means 'thing' in Wakhi.[55] When modified with the quantifiers *ɐr* 'all', *ji* 'one', and *ʊt͡ʃ* 'none', it forms the indefinite pronouns 'everything, anything, whatever', 'something', and 'nothing', respectively. Examples of each of these constructions are given in (199) – (201).

(199) ***ɐr t͡ʃiz*** *ki tu t͡sʊ çɐn, sɐk qbɨl t͡sɐr-ən.*
all thing COMP 2SG.NOM SBJV say.2SG 1PL.NOM acceptance do-1PL
'Whatever you might say, we accept.' (25.033)

(200) *tɐw=əʂ rʊmi-əm də məktɐb*
2SG=IPFV send-1SG LOC school

ki tu rɐ ***ji t͡ʃiz*** *jɔd dərz.*
COMP 2SG.NOM down.to one thing memory take.2SG
'I send you to school so you will learn something down there.' (01.10)

(201) *t͡sʊ ti dɐst=ən* ***ʊt͡ʃ t͡ʃiz*** *nʊ=wizit.*
from 2SG.GEN hand=ABL none thing NEG=come.3SG
'Nothing comes from your hands.' (04.51)

[55] At this time, it is unclear if *t͡ʃiz* is polysemous or homophonous. Etymological and comparative research are needed to determine the answer to this question.

3.3.5.6 t͡ʃizr 'why?'

In Afghan Wakhi, the interrogative *t͡ʃizr* means 'why?', as seen in (202). This word may have developed from the interrogative pronoun *t͡ʃiz* 'what?' inflected with the Dative marker *=r*, i.e., 'what for?'. I follow the same approach with *t͡ʃizr* as I do with *kumr* (cf. §3.3.5.4); i.e., I gloss it as a monomorphemic word.

(202) *tu=ʂ* *dɐrs* ***t͡ʃizr*** *nʊ=d͡ʒɔj?*
2SG.NOM=IPFV lesson why NEG=read.2SG
'Why don't you study?' (01.02)

In addition to its function as a question word, *t͡ʃizr* can also form a construction with the generic complementizer *ki*. This construction means 'because' and serves as a complementizer that introduces reason clauses, as seen in (203).

(203) *wɔz* *çɨ* *sɐr=i* *prʊt* *xɐʂ,*
then self.GEN head=ACC forward pull.2SG

wɔz *çɨ* *sɐr=i* *pɐs* *xɐʂ,*
then self.GEN head=ACC back pull.2SG

t͡ʃizr ki *ɐw* *ɐw=ən* *t͡ʂɐx-t.*
why COMP 3SG.DIST 3SG.DIST=ABL cluck-3SG
'Then pull your head back, then pull your head back, because it [the magpie] clucks from that.' (25.307)

3.3.5.7 t͡ʃəkɔrɐ 'what?'

In addition to *t͡ʃiz* (cf. §3.3.5.5), Afghan Wakhi has another interrogative pronoun that appears to mean 'what?': the word *t͡ʃəkɔrɐ*. This word seems to be significantly rarer than the alternative *t͡ʃiz*, given that I have only one example of it occurring in my data, which can be seen in (204). In this example, *t͡ʃəkɔrɐ* functions as the predicate of a classification clause (cf. §5.2.2.1), thereby making it interrogative.

(204) *tu* ***t͡ʃəkɔrɐ*** *ʊmi* *ki* *mɐrək* *əm* *d͡zi* *gɐp* *di?*
2SG.NOM what COP.SBJV.2SG COMP 1SG.DAT PROX like.this chat hit.2SG
'What might you be that you talk to me like this?' (25.123)

3.3.5.8 t͡səts͡ɔxt 'how / what kind?'

The question word *t͡səts͡ɔxt* can function as both an adverbial and an adjectival question word, depending on which constituent of the clause it questions. In its adverbial function, it means 'how?' as seen in (205). When functioning as an interrogative adjective, it means 'what kind?', as illustrated by (206).

(205) *tɐw* *ɐw* ***t͡səts͡ɔxt*** *ʃit-i?*
2SG 3SG.DIST how kill-PST
'How did you kill it?' (25.139)

(206) *tɐw* ***t͡səts͡ɔxt*** *ðəwɟd=ʊt* *jʊçk* *kər-k?*
2SG what.kind daughter=2SG learning do-PRS
'What kind of daughter have you raised?' (04.41)

3.3.5.9 t͡sərəng 'how?'

In Afghan Wakhi, the word *t͡sərəng* is another interrogative with multiple functions. In one of its functions, it is another way to ask 'how?', as seen in (207). When used in construction with the verb *çɐk* 'to make, to do', the resulting construction is an idiomatic expression meaning 'What should I do?', as seen in (208). It can also be used to question the hypothetical outcome of an action, as demonstrated by the counterfactual clause given in (209).

(207) *jɐw* *jɐn* ***t͡sərəng*** *ʐi* *sɐr* *rɐqɐm?*
3SG.DIST then how 1SG.GEN head type
'Then how is it like my head?' (06.30)

(208) *xɐj,* ***t͡sərəng*** *gɔ-məm?*
INTJ how do-1SG
'Well, what should I do?' (04.11)

(209) *ini niv əm ʂər* ***t͡sərəng*** *çət tu?*
INTJ now PROX city how do.PRF COP.PST
'So now what would you have done to this city?' (lit., 'How would you have done this city?') (TEX-0025.08)

3.3.5.10 t͡sʊrək 'why?'

A second interrogative meaning 'why?' (cf. §3.3.5.6) is *t͡sʊrək*. Thus far, my corpus contains only a single example of this word, which is shown in (210). Additional examples are needed to determine what differences, if any, there are between *t͡sʊrək* and *t͡ʃizr* in terms of meaning and syntactic distribution.

(210) *tu=t* ***t͡sʊrək*** *əm d͡zi çʊt-k?*
2SG.NOM=2SG why PROX way do-PRS
'Why have you done (things) like this?' (01.15)

3.3.5.11 t͡sum 'how many / how much?'

The Afghan Wakhi word *t͡sum* is used to question the amount or quantity of something. It can be translated as either 'how many?' or 'how much?', depending on the inherent properties (e.g., count vs. mass noun) of the entity it modifies. For example, in (211), it is used to question the countable number of humps on a camel, and thus is best translated as 'how many'. This word may also be used as an indefinite quantifier that I translate as 'however,' as seen in (212).

(211) *ʂtər=ən* ***t͡sum*** *kʊp?*
camel=POSS how.many hump
'How many humps do camels have?' (01.27)

(212) *ku* ***t͡sum*** *bəlɛnd t͡sʊ ʊmʊ-t,*
mountain however tall SBJV SBJV.COP-3SG

ji vəduk jɐw=ən skɐ t͡susk tʊj.
one road 3SG.DIST=POSS on top COP
'However tall a mountain may be, it has a path to the summit.' (Wakhi proverb)

3.3.5.12 t͡sɔɣdr 'when?'

The adverbial interrogative *t͡sɔɣdr* 'when' is used to ask temporal questions, as in (213). When asking temporal questions that include a constituent other than the subject, that constituent may be postposed after the verb, as seen in (214).

(213) *tu=ʂ* ***t͡sɔɣdr*** *kɔbʊl* *rʊʈ͡ʂ?*
2SG.NOM when Kabul go.2SG
'When are you going to Kabul?'

(214) *tu=ʂ* ***t͡sɔɣdr*** *rʊʈ͡ʂ* *tər* *çɨ* *tɐt* *xun?*
2SG.NOM when go.2SG over.to self.GEN father house
'When are you going to your father's house?'

As I have shown in §3.3.1 – §3.3.5.12, Afghan Wakhi has a number of pronouns of different types. Having described these pronouns and their functions, I next turn to the internal structure of the noun phrase.

3.4. Noun Phrase Structure

In Afghan Wakhi, noun words do not always occur individually; they may be modified by various other words and phrases. A noun and its modifiers form a larger referring expression—a noun phrase (NP)—that has its own internal structure. In this section, I describe the internal structure of the Wakhi noun phrase, including constructions used for modification, possession, and relativization.

Nouns may be modified by a demonstrative (215), an adjective phrase (216), a number (217), a quantifier (218), or a pronominal possessor (219). A noun may even be modified by another noun phrase, in which case the modifying NP functions as an adnominal possessor or a descriptive modifier, as seen in (220) and (221), respectively.

(215) DEM N
[***jʊt*** *kərmiʈ͡ʃ*] *vit-i* *tər* *xʂɔk* *bɐnd.*
MED sneaker become-PST over.to dirt.clod stuck
'That sneaker got stuck on a dirt clod.' (05.29)

(216) AP N
[[***d͡zqlɐj***] *ʃupk*] *dɐ diqɔn kɐf tu-ʊt-k*
small stick LOC farmer palm COP-PRF-PRS
'A small stick was in the farmer's hand.' (25.037)

(217) NUM N
ɐr diɔr tɐqribɐn sɐk [***ɐt*** *mɨj*] *jɐrk=ən=əʂ kər-ti.*
all village approximately 1PL.NOM eight month work=1PL=IPFV do-PST
'In every village we would work for approximately eight months.' (TEX-0132.11)

(218) QNT N
jəm ki [***tum*** *zɐmɐt*] *win-di t͡ʃʊj.*
3SG.PROX COMP this.much trouble see-PST SBJV.COP
'He who experienced (lit., saw) this much trouble.' (25.490)

(219) NP_{POSS} N
[[***spɔ***] *dɐrs*] *ʂtər tu.*
1PL.GEN lesson camel COP.PST
'Our lesson was camels.' (01.33)

(220) NP_{POSS} N
jɐkdɐm [[***ʊt kɐʂ***] *t͡ʂɨzɻm*] *ʊʈ wɔst.*
at.once MED boy eye open become.3SG
'At once the boy's eyes open.' (25.549)

(221) NP N
də [*çɨ* [[***xun***] *xɐlg=ən*]] *mɐslɐt t͡sɐr-əm.*
COM self.GEN house person=ABL discussion do-1SG
'I will discuss with my family (lit., 'house people'). (TEX-0003.024)

As examples (215) – (221) show, all modifiers precede the head noun in basic Afghan Wakhi syntax. Several types of modification exhibit their own internal structures and therefore merit further description. These include adjective phrases (§3.4.1), adnominal possession (§3.4.2), and relative clauses (§3.4.3). After describing these phrasal and clausal modifiers, I discuss the order of modifiers within an NP that follows basic Afghan Wakhi syntax (§3.4.4), as well as the syntax of NPs that use a Persian-type *ezafe* construction (§3.4.5).

3.4.1 Adjective Phrases

Afghan Wakhi has a fairly large open class of adjectives. An adjective serves as the head of an adjective phrase (AP), which may or may not include a pre-adjectival intensifier. Examples of APs with and without an intensifier are given in (222) and (223).

(222) INTS ADJ
ɔ, jɐw [ɣɐ **xuzg**].
yes 3SG.DIST INTS sweet
'Yes, it's very sweet.' (06.29)

(223) ADJ N
jʊt [[**xɔr**] kʊnd] ʊt çɨ pʊtr=ər çɐn-d ki . . .
MED disfavored wife MED self.GEN son=DAT say-3SG COMP
'The disfavored wife says to her son that . . .' (25.41)

Adjective phrases have several syntactic functions. First, an AP can be used to modify a head noun. As an adnominal modifier, an AP usually precedes the noun it modifies (224). However, in an NP that uses the borrowed Persian *ezafe* construction, the AP follows the head noun instead of preceding it (225).[56]

(224) AP N
[[**d͡zqlɐj**] ʃʊpk] də diqɔn kɐf tu-ʊt-k.
small stick in farmer palm COP-PRF-PRS
'A small stick was in the farmer's hand.' (TEX-0310.06)

(225) N AP
ʊt jiwʊk [[diw=ɪ] [**sɐfid**]] wəz-di.
and at.once ogre=EZ white come-PST
'And suddenly the white ogre came.' (25.189)

An AP can function as the nonverbal predicate in a property clause, as seen in (226) and (227). For a more detailed description of property clauses, see §5.2.2.2 and §5.2.3.2.

[56] For a fuller description of *ezafe* constructions, see §3.4.5.

(226) NP AP
[*ti* *kərmit͡ʃ*] [***t͡ʃut***].
2SG.GEN sneaker torn.
'Your sneaker is torn.' (05.28)

(227) NP AP
e *kɐ,* *tu* [***yɐ*** ***xiɐr***] *=ʊt* *tu-ʊt-k,* *e* *pɐhɐ!*
VOC boy 2SG.NOM INTS old=2SG COP-PRF-PRS VOC INTJ
'Dude, you are so old, oh wow!' (06.72)

In addition to functioning as an adnominal modifier or a nonverbal predicate, an AP may also function as the preverb of a light verb construction, as in (228) and (229). Chapter 6 gives a comprehensive description of light verb constructions.

(228) AP
tɐw *ˌjuz* [***tiɔr***] *kər-ti?*
2SG firewood ready do-PST
'Did you ready the firewood?' (05.05)

(229) AP
ɐw *tɐw=i* *gɔç-t* [***nɔ-kɔm***].
3SG.DIST 2SG=ACC make-3SG PRIV-successful
'He will fail you.' (05.44)

3.4.2 Adnominal Possession

Afghan Wakhi has three different constructions for adnominal possession. Although all three constructions involve embedding a possessive NP (NP_{POSS}) within the larger NP that contains the head noun (possessee), each individual construction exhibits its own unique composition and syntax.

In the first and most frequent construction used to express adnominal possession, the NP_{POSS} precedes the head noun (possessee). Any NP may function as the NP_{POSS} as long as it follows basic Afghan Wakhi NP syntax (i.e., it does not use the *ezafe* construction). The NP_{POSS} is in either the Default form (nouns and 3SG pronouns) or the Genitive form (1st and 2nd person pronouns). Examples of this construction are given in (230) – (232).

(230) NP_{POSS} N
[[***ti***] *pʊtr*] = *əʂ dɐrs* *nʊ* = *d͡ʒɔj-d.*
2SG.GEN son=IPFV lesson NEG=read-3SG
'Your son doesn't study.' (01.01)

(231) NP_{POSS} N
ki *jɐw* [[***ji*** ***pɔtʃɔ***] *ðəwɻd*].
COMP 3SG.DIST one king daughter
'Because she is a [certain] king's daughter.' (TEX-0014-1.51)

(232) NP_{POSS} N
t͡s = *ʊt* = *ən* [[***əm*** ***ʃurɐwi***] *t͡ʃɐrxbɔl* = *əʃ*] *sɐk* *dəʐ-d* *jut.*
from=MED=ABL PROX Soviet helicopter=PL.DFLT 1PL.NOM take-PST carry.PST
'Taking us from there the Soviets' helicopters transported us.' (TEX-0023.038)

In the second possessive construction, the head noun (possessee) is followed by a personal pronoun that is marked for POSS case.[57] The possessee may or may not be modified by a prenominal demonstrative, as seen in (233) and (234), respectively.

(233) DEM N NP_{POSS}
t͡ʃilgɐzmɐk *t͡ʃilgɐzmɨj,* [*əm* *ʂɐfʂ* [***əm*** = ***ən***]] *də* *t͡ʃil* *ɔd͡ʒrɐ* = *i* *drən*
forty.meter.neck forty.meter.hair PROX hair 3SG.PROX=POSS LOC forty brick=EZ deep

di-ʊt-k, *vənd-ʊt-k.*
hit-PRF-PRS fasten-PRF-PRS
'As for the forty-meter-necked, forty-meter-haired lady, her hair [lit., 'this hair of hers'] has been put in forty deep bricks and fastened.' (25.300)

(234) N NP_{POSS}
ɐgɐr [*t͡ʂɨzʐm* [***ɐw*** = ***ən***]] *bɐstɐ* *tu,*
if eye 3SG.DIST=POSS closed COP.PST

diʃ *ki* *ɐw* *bidɔr.*
know.2SG COMP 3SG.DIST awake
'If her eyes [lit., 'the eyes of hers'] are closed, you know that she is awake.' (25.302)

The third possessive construction minimally comprises a POSS-marked NP, a pronominal possessor (either an unmarked 3SG pronoun or a GEN-marked SAP pronoun) that is coreferential

[57] Recall from §3.1.3.7 that the possessive case is usually used to mark the possessor argument in a predicative possession construction.

with the first possessor, and the head noun (possessee), in that order (235). Both the initial possessor and the possessee may be internally complex NPs, and either may be human (nominal), human (pronominal), animate, or inanimate as seen in (235) – (238), respectively.

(235) NP$_{POSS}$ NP$_{POSS}$ AP N
ini [[***pɔtʃɔ=ən***] [***ɐw***] [*nɔziun*] *pʊtr=əʃ*] *əm* *d͡zi* *zɪndɐ-gi* *wɔzɔm-di.*
INTJ king=POSS 3SG.DIST favored son=PL.DFLT PROX way alive-NMLZ bring-PST
'See here, the king's favored sons [lit., 'of the king, his favored sons'] brought this kind of wealth.' (25.558)

(236) NP$_{POSS}$ NP$_{POSS}$
[[***ʐi=nən***] [*ʐi*] *ʂɐfʂ*] *niv* *wɔz* *wizit.*
1SG=POSS 1SG.GEN hair now again come.3SG
'My hair [lit., 'of mine, my hair'] is coming again now.' (06.45)

(237) NP$_{POSS}$ NP$_{POSS}$ N
[[***nəxt͡ʃir=ən***] [***jɐw***] *bit͡ʃkɐm*] *jɐr* *ʃɔjid.*
fox=POSS 3SG.DIST tail 3SG.DIST.DAT witness
'A fox's tail [lit., 'of a fox, his tail'] is his witness.' (Wakhi proverb)

(238) NP$_{POSS}$ NP$_{POSS}$ N
[[***jəm wuq=ən***] [***əm***] *mis=i*] *dɐ* *rit͡sən* *ʂux* *t͡sɐr-t.*
PROX yurt.rafter=POSS 3SG.PROX tip=ACC LOC skylight secure do-3SG
'He secures the yurt rafter's tip [lit., 'of the yurt rafter, its tip'] to the skylight.' (TEX-0253.13)

3.4.3 Relative Clauses

In Afghan Wakhi, a head noun may be modified by a relative clause. A relative clause is introduced by the generic complementizer *ki* 'COMP' and usually immediately follows the head noun that it modifies.[58] Syntactic functions that can be relativized include subjects (239) and direct objects (240). The relativized function of the head noun is most typically indicated by a gap within the relative clause. However, example (240) shows that when a relative clause modifies a direct object, it follows the verb of the main clause and includes a resumptive

[58] The complementizer *ki* is also used to introduce various types of complement clauses and adverbial clauses.

pronoun.[59] It remains to be seen whether it is possible to relativize an indirect object since I currently have no examples of such a construction in my corpus.

(239) *əm kɐ̨ş kur vit-i,*
PROX boy blind become-PST

[***jəm*** [*ki tum zɐmɐt win-di t͡suj*]].
3SG.PROX COMP this.much trouble see-PST SBJV.COP
'This boy became blind, the one who experienced so much trouble.' (25.490)

(240) *wuz ɐ=*[***jɐ*** ***t͡ʃiz***] *ʂkurg-əm*
1SG.NOM EMPH=DIST thing search-1SG

[*ki tɐw* ***ɐw*** *mɔʃ-ti t͡suj*].
COMP 2SG 3SG.DIST hide-PST COP.SBJV
'I am searching for that thing that you hid.' (22.11)

Any NP may be relativized, regardless of animacy. For example, the generic complementizer *ki* 'COMP' is used to relativize an NP that refers to a human in (239). But in (240), it relativizes the inanimate NP *jɐ t͡ʃiz* 'that thing', and in (241), it relativizes the indefinite pronoun *ɐr t͡ʃiz* 'whatever'.

(241) [***ɐr t͡ʃiz*** [*ki tu t͡su çɐn*]],
all thing COMP 2SG.NOM SBJV say.2SG

sɐk qəbɨl t͡sɐr-ən.
1PL.NOM acceptance do-1PL
'Whatever you might say, we accept.' (25.033)

The head noun modified by a relative clause may be unmarked for specificity, as seen in (239) – (242), but it is also very commonly marked with the specificity marker *=i* (243). Since a relative clause often serves to make an NP more identifiable and specific, it makes sense that the specificity marker is also used in such contexts.

[59] Cross-linguistically, it is common for languages to restrict finite complement clauses to certain syntactic locations, such as sentence-final position (Noonan 2007: 92–96).

(242) *jɐw jɐrk wɔz mɐsɐlɐn* [***dɐftɐr=ɐʃ***
3SG.DIST work then for.example office=PL.DFLT

[*ki dɔ qɐriɐ=v=i jɐrk t͡sʊ t͡sɐr-ɔn*]].
COMP LOC village=PL.OBL=SPEC work SBJV do-3PL
'Their work then for example is the offices that work in the villages.' (TEX-0306.11)

(243) *ɐ=*[***dɐrs=i*** [*ki t͡sʊ rut-k*]], *wuz ɐw diʃ-ɔm.*
EMPH=lesson=SPEC$_j$ COMP SBJV give-PRS 1SG.NOM 3SG.DIST$_j$ know-1SG
'The lesson that he gave, I know it.' (01.51)

Although the relativized noun *dɐrs=i* 'lesson=SPEC' in (243) is semantically the object of the main clause, syntactically it is left-dislocated, as evidenced by the pause (indicated by a comma) between the relative clause and the main clause. The main clause itself has a resumptive pronoun *ɐw* '3SG.DIST' that is coreferential with 'lesson' and that functions as the syntactic object of the verb *diʃ-ɔm* 'know-1SG'. The pragmatic function of this construction is currently unclear. Based on similarities to other clauses with fronted constituents (cf. §5.2.3.6), it may serve a topicalizing purpose; however, a detailed study of fronting, including associated prosodic features, is needed to determine the function of this and similar constructions.

3.4.4 Order of Modifiers

When multiple words and / or phrases modify the same noun, they follow a specific order. A demonstrative precedes an AP or a number, as seen in (244) and (245), respectively. Example (246) shows that a demonstrative also precedes an adnominal possessor.

(244) DEM AP N
tu [*ɔm ɔxir-ɔng guʂt*] *dɔ ʐɨ ˌjɐʂ t͡sʊ kɐr-t,*
2SG.NOM PROX end-SUPER meat LOC 1SG.GEN mouth SBJV throw-PST

ɔm t͡ʃiz=ɔn tu?
3SG.PROX what=POSS COP.PST
'This final meat that you threw in my mouth, whose was it?' (25.345)

(245) DEM NUM N
[*jəm* [*si u du*] *məktɐb-i*] *d=əm=ən giz-d jɐkdɐm t͡ʂit.*
PROX thirty and two school-NMLZ COM=3SG.PROX=ABL rise-PST at.once go.3SG
'These thirty-two schoolchildren rise and leave with him at once.' (TEX-0014-1.59)

(246) DEM NP_{POSS} N
səwɔr wɔst ʊt [*əm çɨ xɐnduni*] *kɐr-t dəm çɨ t͡sbɐs.*
riding become.3SG and PROX self.GEN puppy put-3SG LOC.PROX self.GEN back
'He mounts and puts his puppy behind him.' (25.554)

As I describe in §3.4.1, an AP may also modify a noun. When no other modifiers are present, an AP immediately precedes the noun it modifies (247). A number precedes an AP (248) but follows an NP_{POSS} (249). Example (250) shows that this order holds when an NP_{POSS}, number, and modifying noun all occur in the same NP.

(247) AP N
tu [[*ɣɐ wʊʂ-ʊt-nɔk*] *mərdinɐ*] *=t t͡sʊ tu-ʊt-k.*
2SG.NOM INTS fear-PRF-ADJ man=2SG FACT be-PRF-PRS
'You were a very frightening man.' (10.04)

(248) NUM AP N
[*ji sʊkr ʃɐt͡ʃ*] *wəz-di.*
one red dog come-PST
'One red dog came.' (25.136)

(249) NP_{POSS} NUM N
[*jəm bu t͡ʂɨzm̩*] *kur vit-i.*
3SG.PROX two eye blind become-PST
'His two eyes became blind.' (25.484)

(250) NP_{POSS} NUM N N
[*çɨ ji pɐlɨw t͡ʂɨzm̩*] *niçind.*
self.GEN one side eye pull.out.2SG
'Pluck out your eye on the one side.' (lit., 'Pull out your one side eye.') (25.469)

When a number is used to modify certain nouns, a classifier may accompany it. To date, I am aware of only two classifiers in Afghan Wakhi: *dɔnɐ* (lit., 'grain') is used for inanimate

objects (251),[60] and *sɐr* (lit., 'head') is used for people and animals (252). I gloss both classifiers as 'CLF'. Although a number can be used without a classifier, a classifier cannot occur without a number. When used, a classifier always follows a number, as seen in both (251) and (252).

(251) NUM CLF N
ki wuz ɐ=[tru ***dɔnɐ*** *diw=v=i] ʃɐj-əm.*
COMP 1SG.NOM EMPH=three CLF ogre=PL.OBL=ACC kill-1SG
'So I can kill the three ogres.' (25.151)

(252) NUM CLF N
[*ji* ***sɐr*** *xɐlg*] *bil tər ɟɐr dʊʃt.*
one CLF person shovel over.to stone hit.3SG
'One group of people beats shovels against stones.' (Solar and Lunar Eclipses 5)

A noun may also be modified by a quantifier. Quantifiers and numbers do not belong to the same word class, as evidenced by the fact that they occupy different positions in the NP. Quantifiers precede both demonstratives (253) and numbers (254), but numbers follow demonstratives (255). I have no examples in my corpus of a quantifier and a classifier co-occurring in the same NP, but testing with native speakers is needed to determine whether this indicates that quantifiers and classifiers cannot co-occur, or whether it is simply an accident of the data.

(253) QNT DEM N
[*kɬli əm mərdʊm*]*=v=i d͡ʒɐm t͡sɐr-t.*
all PROX people=PL.OBL=ACC gathered do-3SG
'He gathers all the people.' (25.016)

(254) QNT NUM NUM NUM N
sɐk rʊt͡ʂ-ən, [*jiɟun ji buj truj mujsfid*] *dərz-ən rʊt͡ʂ-ən.*
1PL.NOM go-1PL some one two three old.man take-1PL go-1PL
'We will go, taking some two or three old men we will go.' (02.54)

[60] As mythical beings, ogres apparently fall into the inanimate category, as evidenced by the use of *dɔnɐ* in (249).

(255) DEM NUM N
[*jəm* [*si u du*] *məktɐb-i*] *d=əm=ən* *giz-d* *jɐkdɐm* *t͡ʂit.*
PROX thirty and two school-NMLZ COM=3SG.PROX=ABL rise-PST at.once go.3SG
'These thirty-two schoolchildren rise and leave with him at once.' (TEX-0014-1.59)

Example (255) illustrates two additional properties of noun phrases: (a) a demonstrative that modifies a noun is always singular, even when the head noun is plural (see also (253)); and (b) a noun that is modified by a number is not morphologically marked for plural number when it functions as the subject. In contrast, an enumerated noun functioning as an object may be either marked or unmarked with the oblique plural marker *=v*, as seen in (253) and (254), respectively.

3.4.5 Persian-Type *ezafe* Constructions

Afghan Wakhi speakers occasionally use an alternate NP construction that is borrowed from Persian. In Persian-style NPs, the head noun (or head NP) is marked with the linking enclitic *=i*, which in Persian is called the *ezafe* (EZ). Modifiers then follow the head noun. Several types of modifiers can follow the head noun, such as an AP (256), a quantifier (257), an NP_{POSS} (258),[61] or even a descriptive noun phrase (259).

(256) N=EZ AP
[*rɐftɔr=i* *bɐf*]=*əʂ* *nʊ=kər-ti.*
behavior=EZ good=IPFV NEG=do-PST
'(He) didn't treat (him) well.' (lit., 'He didn't do good behavior.') (25.007)

(257) N=EZ QNT
mɐzᵢ ɣɐ [*zɐmɐt=i* *ziɔt*] *jit-i.*
1SG INTS trouble=EZ a.lot eat-PST
'I really experienced a lot of trouble.' (25.599)

[61] A first- or second-person possessor that follows the head noun in an *ezafe* construction must be in the Default case, as seen in (256) (cf. §3.1.3.2).

(258) NP=EZ NP$_{POSS}$
[[*ʃtrʊç kʊʈ-ɐk*] *= i* *mɐzᵢ*] *qism-i* *tu*
flour throw-INF=EZ 1SG kind-NMLZ COP.PST

ki *ɐwɐl çɐt = əm* *wuz* *pərtʃ͡ɔd = i* *win-di.*
COMP first self=1SG 1SG.NOM girl=ACC see-PST
'My engagement [lit., 'flour throwing'] was like this, that first myself, I saw a certain girl.' (TEX-0003.06)

(259) N=EZ [NP$_{POSS}$ N]
ɣɐ *bʊ* [*tidɔd = i* [*zᵢ* *ɐnɖwɔl = əʃ*]] *ʃɐjid* *vit.*
INTS also number=EZ 1SG.POSS friend=PL.DFLT martyr become.PST
'Also a great number of my friends were killed (lit., 'martyred').' (TEX-0023.064)

The *ezafe* construction is not restricted to NPs with only a single modifier. The *ezafe* not only links a head noun to a modifier, but it also links modifiers within a noun phrase. Therefore, if multiple modifiers follow the head noun, each successive modifier except for the final one is also marked with the *ezafe*, as seen in (260).

(260) NUM N=EZ NP=EZ AP
[*ji* *pisʊk = i* *jupk = i* *dəjɐr*] *rɐnd.*
one tiny=EZ water=EZ another give.2SG
'Give (me) another tiny bit of water.' (25.470)

The *ezafe* construction may also be used in conjunction with a prenominal modifier. In such Persian-Wakhi hybrid NPs, the phrase-initial constituent is usually a modifier with a determiner-like function, such as a demonstrative (261), a number ((260) and (262)), or a possessor (263).

(261) DEM N=EZ NP
ɐ = [jəm *fɐsl = i* *bɐhɔr*] *= ən = əv = əʂ* *bʊ* *sɐk* *jut-i*
EMPH=PROX season=EZ spring=ABL=3PL=IPFV also 1SG.NOM carry-PST

ðɐrt *din-ɡ-i.*
manure hit-INF-NMLZ
'During the spring season they also used to take us to spread manure.' (TEX-0023.18)

(262) NUM N=EZ AP

t͡ʃilgɐzmɐk t͡ʃilgɐzmɨj, əm ʂɐfʂ əm=ən də [t͡ʃil ɔd͡ʒrɐ=i drən]

forty.meter.neck forty.meter.hair PROX hair 3SG.PROX=POSS LOC forty brick=EZ deep

di-ʊt-k, vənd-ʊt-k.

hit-PRF-PRS fasten-PRF-PRS

'As for the forty-meter-necked, forty-meter-haired lady, her hair has been put in forty deep bricks and fastened.' (lit., 'this hair of hers') (25.300)

(263) NP_{POSS} N=EZ AP

[ʐɨ bɔz t͡ʃigɐsuk=i tilɔ-ɨ] ki wɔzɔm-di?

1SG.GEN then shelf=EZ gold-ADJ who bring-PST

'Who then stole my golden shelf?' [62]

In §3.4, I have shown that noun phrases in Afghan Wakhi can range from simple to complex; that is, they may be instantiated by a single noun or pronoun, or they may include a number of adnominal modifiers. When multiple modifiers occur in the same NP, they may follow basic Afghan Wakhi syntax and precede the head noun, or they may follow the head noun in a Persian-type *ezafe* construction. However, relative clauses always follow the head noun. This account of NP-internal syntax concludes my description of referring expressions that belong to the category of noun phrases. I next discuss subject-indexing enclitics, which are the second type of referring expression in Afghan Wakhi.

3.5. Subject-Indexing Enclitics

Thus far, I have described one overarching type of referring expression in Afghan Wakhi: the noun phrase. However, Afghan Wakhi has another type of referring expression, namely, a set of enclitics that index the subject. I include the subject-indexing enclitics as referring expressions because (a) it is highly likely that they developed diachronically from lexical pronouns,[63] and

[62] It is not uncommon for clause-level adverbs to occur as the second word of a clause even if they interrupt another constituent, as the adverb *bɔz* 'then' does in (230).

[63] The grammaticalization process from free pronoun → clitic pronoun → subject-indexing morpheme is attested in a number of other Iranian languages (cf. Haig 2018: 59, 62; Haig 2020: 93, 98).

(b) because they are often the only expression of the grammatical subject in a clause. The paradigm of subject-indexing enclitics is displayed in Table 3.11.

Table 3.11. Subject-indexing enclitics

person	SG	PL
1	*=əm*	*=ən*
2	*=ʊt*	*=əv*
3	*=i*	*=əv*

In Afghan Wakhi, the subject-indexing clitics occur in contexts where subject-indexing suffixes (cf. §4.3.1) cannot occur (i.e., in constructions with past or perfect stem verbal forms, with non-subjunctive copular forms, and in nonverbal clause constructions) (cf. Obrtelová 2019: 60; SanGregory 2025d: 122–124). Descriptions of these enclitics vary in the literature. Hughes (2011: 13; 2014: 115), Bashir (2009: 835), and Shaw (1876: 14) all analyze these morphemes as pronominal enclitics. Morgenstierne (1938: 505–506) calls them "detachable suffixes", and Grünberg & Stéblin-Kamensky (1988b: 51–52) refer to them as "mobile endings". In (SanGregory 2025d: 123), I analyze these enclitics as subject-indexing morphemes because they appear in complementary distribution with the subject-indexing suffixes used with nonpast verbs (cf. §4.3.1).

The subject-indexing enclitics can attach to hosts from a variety of different word and phrasal classes, including nominal NPs (264), pronominal NPs (265), adjective phrases (266), prepositional phrases (267), and verbs (268). In other words, a subject-indexing enclitic can attach to the end of any constituent in the clause. Examples (266) and (267) also show that subject-indexing enclitics may be used in nonverbal predicate constructions.

(264) *xɐj, wuz [mɔl]=v=**əm** ðəwʝ-ni.*
DISC 1SG.NOM flock=PL.OBL=1SG milk-PST
'Well, I milked the flocks.' (03.31)

(265) *mɐgɐm* [*wuz*]*=**əm*** *ʊt* *gɐp-ɔ* *nʊ=vit.*
but 1SG.NOM=1SG MED talk=PL NEG=become.PST
'But those things didn't happen to me.' (lit., 'I didn't become those things.') (TEX-023.67)

(266) *tu* [*ɣɐ* *d͡zqlɐj*]*=**ʊt.***
2SG.NOM INTS small=2SG
'You are very small.' (05.60)

(267) [*tɐ* *xun*]*=**ʊt*** *bʊ* *nʊ=tu!*
up.to house=2SG also NEG=COP.PST
'You weren't up at the house either!' (03.16)

(268) *wuz* *jɐn* *wɐxt=i* *ki* [*çɐt*]*=**əm*** *wuz* *kʊnd* *jund-əm. . .*
1SG.NOM then time=SPEC COMP say.PST=1SG 1SG.NOM wife take-1SG
'Then when I say that I will take a wife. . .' (lit., 'When I said I will take a wife. . .') (02.47)

Multiple clitics can occur within the same clause and index the same subject, as seen in (269).[64] However, a subject-indexing clitic can only occur in constructions in which the NP subject is unexpressed (270) or in the Nominative case (271).[65] Any attempts to use a subject-indexing clitic in a construction with a differentially marked (i.e., Default case SAP pronoun) subject are not accepted by native speakers, as illustrated by the ungrammatical example in (272) (cf. the acceptable use of DSM in (273)).

(269) *ɐn* *də* *ɐwɐl=**ən*** *ji* *nɔɣɐrdum=**ən*** *win-di.*
then LOC beginning=1PL one bear=1PL see-PST
'Then at the beginning we saw a bear.' (Bear Encounter 3)

(270) *∅* *tɐ* *xun=**ʊt*** *bʊ* *nʊ=tu.*
(2SG) up.to house=2SG also NEG=COP.PST
'You weren't up at the house either.' (03.16)

[64] Grünberg & Stéblin-Kamensky (1988b: 51–52) also observe that multiple subject-indexing clitics may appear in the same clause.

[65] When a subject-indexing enclitic indexes a nominal NP or 3rd person referent, it can only occur in a construction where the subject is unexpressed or in the Default case (since such NPs do not have a Nominative form).

(271) ***tu*** *tɐ* *xun=**ʊt*** *bʊ* *nʊ=tu.*
2SG.NOM up.to house=2SG also NEG=COP.PST
'You weren't up at the house either.' (Elicited based on (270))

(272) ****tɐw*** *tɐ* *xun=**ʊt*** *bʊ* *nʊ=tu.*
2SG up.to house=2SG also NEG=COP.PST
intended: 'You weren't up at the house either.' (Elicited based on (270))

(273) *e* *tɐt,* ***tɐw*** *liw* *vit-k.*
VOC father 2SG crazy become-PRS
'Father, you've gone crazy.' (02.06)

The subject-indexing enclitics of Afghan Wakhi follow a nominative-accusative alignment pattern. That is, these enclitics index an argument functioning as an intransitive subject (274) or a transitive subject (275), but they never index a direct object.

(274) NP_{SUBJ}=SUBJ
[***wuz***]***=əm*** *məktɐb tu.*
1SG.NOM=1SG school COP.PST
'I was (at) school.' (01.05)

(275) NP_{SUBJ} NP_{DO} =SUBJ
[***pəlis=əʃ***] [*mɐzˌ*] *win-di* *skə* *zˌi* *t͡sbɐs=**əv*** *wəz-di.*
police=PL.DFLT 1SG see-PST on 1SG.GEN back=3PL come-PST
'The police saw me (and) followed me.' (11.09)

3.6. Summary

In this chapter, I have briefly described the category of referring expressions in Afghan Wakhi, which includes both noun phrases and subject-indexing enclitics. Noun phrases may be headed by either a noun word or a pronoun, both of which themselves can constitute a full noun phrase. A noun phrase may not only function as any core argument in a clause, but may also hold other non-argument roles, some of which will be explored in greater depth in coming chapters. Several types of morphology are unique to the noun phrase, including number marking, case marking, and specificity marking. Case marking exhibits a split between nominative-accusative and neutral alignment.

After overviewing noun words and their characteristics, I have surveyed the many types of pronouns, including demonstratives, personal pronouns, reflexive pronouns, the reciprocal pronoun, and interrogatives. Based on this foundation, I have described the internal structure of noun phrases, including strategies for modifying, possessing, and relativizing nouns. Finally, I have described the subject-indexing enclitics, which are often the sole expression of the clausal subject; these enclitics follow an nominative-accusative alignment.

CHAPTER 4

VERBS AND VERBAL PREDICATION

Speakers of Afghan Wakhi make use of several predication strategies, including verbal predicates, nonverbal predicates, and light verb constructions. In this chapter, I focus on verbal predicates, i.e., predicates that are headed by the word class of verbs, where the verb itself carries substantive lexical meaning. Afghan Wakhi has a fairly small class of lexical verbs, with the total number of verb words estimated to be around 300 (Grünberg & Stéblin-Kamensky 1988b: 48; Bashir 2009: 833). The purpose of this chapter is not to exhaustively describe all forms and functions of such verbs, but rather to focus on those that are most beneficial for understanding the other examples and topics discussed throughout this dissertation.

This chapter is structured as follows. In §4.1, I describe features and morphology common across all types of verbs.[66] These include negative polarity proclitics, interrogative mood and intonation, the polar question clitic, and the imperfective clitic. After this overview of common verbal features, I overview the three-stem verb system (§4.2) and describe the morphology and functions associated with each of the three verb stems in turn. I begin with the nonpast stem in §4.3, followed by the past stem (§4.4) and the perfect stem (§4.5). Although the nonpast and past stems are each used for a single eponymous tense, the perfect stem serves as the base for two verbal forms: the perfect (§4.5.1) and the past perfect (§4.5.2). Finally, I conclude the chapter with a summary of lexical verbal predication in §4.6.

[66] Light verbs, i.e., verbs that occur in light verb constructions (cf. Chapter 6), have the same features and morphology as lexical verbs.

4.1. Basic Features

Afghan Wakhi includes several types of morphology and functions that are common across the verbal system, as well as others that are specific to verbs formed from certain stem types. In this section, I describe the grammatical features common to all lexical verbs. In §4.1.1 I describe the basic structures found in verbal clauses. Section §4.1.2 is devoted to negative polarity proclitics, followed by the related topics of interrogative mood and the polar question enclitic in §4.1.3 and §4.1.4, respectively. The final feature common across the verbal system is the imperfective enclitic, which I describe in §4.1.5.

4.1.1 Basic Clause Structures

In this section, I describe the basic (i.e., pragmatically neutral) clause structure that corresponds to different types of verbs. Every lexical verb can be classified according to its transitivity, i.e., how many arguments it can take. The primary categories of lexical verbs recognized in the literature are INTRANSITIVE, which takes only one argument (coded as the NP_{SUBJ}); TRANSITIVE, which takes two arguments (coded as NP_{SUBJ} and NP_{DO}); and DITRANSITIVE, which takes three (coded as NP_{SUBJ}, NP_{DO}, and NP_{IO}) (Velupillai 2012: 237). Afghan Wakhi has an additional type of three-place predicate that includes a secondary predicate (NP_{PRED2}) instead of an NP_{IO}.

In basic intransitive clauses, the NP_{SUBJ} precedes the verb. Other constituents, such as a modal (276) or descriptive PP (277), may occur between the NP_{SUBJ} and the verb without affecting their relative ordering.

(276) NP_{SUBJ} V
sʁbɔ [*sʁk*] *ʃɔjʁd* ***mʊri-ən***.
tomorrow 1PL.NOM maybe die-1PL
'Tomorrow maybe we will die.' (02.30)

(277) NP_{SUBJ} V
[*kutʃ͡*] *t͡sʊ pɔmir=ən* ***xɐm-di*** *mizɔn mɨj.*
migration from Pamir=ABL descend-PST Mizaan month
'The migration descended from the Pamirs in the month of Mizaan.' (TEX-0003.44)

Transitive clauses include a second argument coded as an NP_{DO}. The direct object follows the subject and precedes the verb. It may optionally take Accusative case marking (278), which unambiguously distinguishes it from the subject. When the direct object is in the Default form, constituent order is the primary criterion for distinguishing between the NP_{SUBJ} and NP_{DO} (279).

(278) NP_{SUBJ} NP_{DO} V
jɐn [*t͡sbɨr xɐlg*] [*jɐ rɨt͡sən=ɨ*] ***wʊdər-t.***
then four person DIST skylight=ACC hold-3SG
'Then four people hold the skylight.' (TEX-0253.12)

(279) NP_{SUBJ} NP_{DO} V
dr=ʊt [*sɐk*] [*çʊtʃ͡*] ***nʊ=pɐt͡s-ən.***
at=MED 1PL.NOM bread NEG=cook-1PL
'There we do not bake bread.' (TEX-0285.04)

The three arguments of a ditransitive clause are coded as the grammatical relations subject, direct object, and indirect object. As with other basic clauses, the subject of a basic ditransitive clause precedes the verb. Both the direct object and indirect object occur between the subject and verb, but their order with respect to each other varies: the direct object may precede the indirect object (280) or *vice versa* (281). Although the different orders do seem to correlate with different verbs (cf. §1.6.2), I cannot determine any other pragmatic differences between them at this point. Therefore, I currently treat both orders as basic.

(280) NP_{SUBJ} NP_{DO} NP_{IO} V
∅ [*kɐm-ʊk=i çʊtʃ͡*] [*mɐr*] ***rɐnd-əv.***
∅ little-DIM=EZ bread 1SG.DAT give-2PL
'Give me a little bit of bread.' (25.218)

(281) NP$_{SUBJ}$ NP$_{IO}$ NP$_{DO}$ V

ini niv [*wuz*] [*sɐv=ər*] [*ji ʒindɐ*] ***çɐn-əm***.

INTJ now 1SG.NOM 2PL=DAT one folktale say-1SG

'So now I will tell you a folktale.' (TEX-0014-1.07)

Afghan Wakhi includes another type of clause with three constituents. However, the third NP in this type of clause is not an indirect object. Instead, it predicates additional information regarding the direct object (cf. Aarts 1995: 76, 78, 80; Groot 2017a: 36). For example, in the sentence *The court appointed Mr. Smith executor of the estate* , the NP *executor of the estate* is in a predicate relationship with *Mr. Smith*. As a result, the statement *Mr. Smith became executor of the estate* is implied to be true. An argument such as this, i.e., one that predicates over another within a verbal clause, is referred to as a SECONDARY PREDICATE (Aarts 1995: 75; Groot 2017b: 2; Groot 2017a: 36). I use the abbreviation NP$_{PRED2}$ to represent the grammatical relation of secondary predicate.[67]

In Afghan Wakhi, an NP$_{PRED2}$ is always in the Default case form. In basic clauses, the NP$_{PRED2}$ follows the NP$_{DO}$ for which it functions as predicate. The NP$_{PRED2}$ expresses the result of some action performed upon the direct object. For example, in (282), the livestock wool becomes felt as a result of the people's efforts. Therefore, the NP$_{PRED2}$ in (282) is an example of a resultative secondary predicate (cf. Aarts 1995: 76–77).[68]

(282) NP$_{SUBJ}$ NP$_{DO}$ NP$_{PRED2}$ V

[*sɐk mərdʊm*] *ɐ=*[*jəm mɔl ɟər=i*] [*jid͡ʒin*] ***gɔç-ən***.

1PL.NOM people EMPH=PROX livestock wool=ACC felt make-1PL

'We people make the livestock wool [into] felt.' (TEX-0118.06)

[67] Cross-linguistically, it is also common for adjective phrases to function as secondary predicates (cf. Aarts 1995: 79–80; Groot 2017a: 36; Croft 2012: 321ff), as in *Mr. Darcy considers Lydia foolish*. The topic of AP secondary predicates in Afghan Wakhi is an area for future research.

[68] The other main type of nominal secondary predicate is called "depictive" (Aarts 1995: 76–77).

Sentence (283) is another example of a secondary predicate construction. The only difference between it and the preceding example is that (283) has a light verb construction (LVC) as its predicate instead of a lexical verb. Otherwise, the order and case marking of constituents is the same. This example illustrates an important fact about clauses with lexical verbs and LVCs: they use the same constituent order in basic clauses. For further discussion and examples of clauses containing LVCs, see Chapter 6.

(283) *mɐsɐlɐn ji diɔr=i ki də bʊjn t͡suj,*
for.example one village=SPEC COMP LOC middle COP.FACT

NP_{SUBJ}	NP_{DO}	NP_{PRED2}	LVC	
∅	[*jɐw=i*]	[*mɐrkɐz*]	***qɐrɔr***	***rɐnd-ən.***
∅	3SG.DIST=ACC	capital	appointment	give-3PL

'For example, a village that is in the middle, (we) appoint it [to be] the capital.' (TEX-0306-1.09)

In summary, Afghan Wakhi has four types of verbal clauses, which are distinguished by the number and type of grammatical relations they require. Table 4.1 displays these clause types along with the basic constructions used for them in pragmatically neutral clauses.

Table 4.1. Basic clause structures

Clause Type	**Basic Construction**
Intransitive	NP_{SUBJ} V
Transitive	NP_{SUBJ} NP_{DO} V
Ditransitive	NP_{SUBJ} NP_{DO} NP_{IO} V NP_{SUBJ} NP_{IO} NP_{DO} V
Secondary Predicate	NP_{SUBJ} NP_{DO} NP_{PRED2} V

4.1.2 Negative Polarity Proclitics

Afghan Wakhi has two morphemes that indicate negative polarity: *nʊ=* and *mʊ=*. The proclitic *nʊ=* is used for basic clausal negation in most contexts. It occurs with indicative verbs

formed from all three verb stems: nonpast (284), past (285), and perfect (286). It is also used with conditionals (287) and non-prohibitive subordinate clauses (288).

(284) *jəm çɨ tɐt qisɐ=i* ***nʊ=****wʊdər-t.*
3SG.PROX self.GEN father story=ACC NEG=hold-3SG
'He does not obey his father.' (lit., 'He does not hold his father's story.') (TEX-0014-1.54)

(285) *wɔz bʊ əm tɐt qbɨl* ***nʊ=****kər-ti.*
then also 3SG.PROX father acceptance NEG=do-PST
'Then again her father did not accept.' (TEX-0003.34)

(286) *tu=t t͡sʊrək əm d͡zi çʊt-k*
2SG.NOM=2SG why PROX way do-PRS

ki rʊç-k rɐ dɐrs=i jɔd ***nʊ=****dəz̧-g?*
COMP go-PRS down.to lesson=ACC memory NEG=take-PRS
'Why have you done [things] like this, that you went down there (and) didn't learn your lesson?' (01.15)

(287) *ɐgɐr guṣt rɐ z̧ɨ jɐṣ* ***nʊ=****kɐt̨,* *wuz wɐz-əm.*
if meat down.to 1SG.GEN mouth NEG=throw.2SG 1SG.NOM fall-1SG
'If you don't throw meat into my mouth, I will fall.' (25.326)

(288) *jəm rʊṣt, kɨ əm jit*
3SG.PROX go.3SG all 3SG.PROX eat.3SG

ki sʊtk ***nʊ=wɔst.***
COMP satiated NEG=become.3SG
'He goes and eats all of it because he doesn't get full.' (25.221)

In the most common negative construction, the basic negative proclitic attaches directly to the verb, as seen in (284) – (288). However, that is not the only possibility. The negative proclitic can occasionally attach to some other pre-verbal constituent. For example, the negative proclitic attaches to the preverb of the LVC *kɐl t͡sɐr* 'you shave' in (289), to the pronominal object of the verb in (290), and to the imperfective enclitic in (291).

(289) *tu=ṣ çɨ sɐr* ***nʊ=****kɐl* *t͡sɐr?*
2SG.NOM=IPFV self.GEN head NEG=bald do.2SG
'Won't you shave your head?' (06.37)

(290) ***nʊ=ɐw*** *wʊdər-əm.*
NEG=3SG.DIST grab-1SG
'I won't grab him.' (25.428)

(291) *çɐt-iː* *ɔ,* ***nʊ=ʂ*** *win-əm.*
say-PST INTJ NEG=IPFV see-1SG
'He said, "Oh, I don't see (it)."' (TEX-0249.53)

The negative proclitic *mʊ=* is used solely in prohibitive constructions (i.e. negative imperatives), regardless of whether those occur in main clauses (292) or subordinate clauses (293). As (293) also illustrates, the prohibitive proclitic can be used for third person commands, i.e., hortative constructions. Like the basic negative proclitic, the prohibitive proclitic can also attach to various classes of words and particles, including a subject-indexing enclitic, as shown in (294).

(292) *bəndɐ=i xɔk-i=r* *tumr* *fiʃɔr* ***mʊ=rɐnd,***
slave=EZ dust-NMLZ=DAT so.much squeezing PROH=give.2SG

ki *jəm* *pərs=əf* *ʂkʊd-ən.*
COMP 3SG.PROX rib=PL.DFLT break-3PL
'Don't squeeze the man of dust so much, because his ribs are breaking.' (25.285)

(293) *jund* *rɐnd* *əm=i* *tər* *ji* *nɐg* *ðɐj=ər*
take.2SG give.2SG 3SG.PROX=ACC over.to one direction husband=DAT

ki *zi̯* *t͡ʂi̯zm* *sk=əm* ***mʊ=jɐt.***
COMP 1SG.GEN eye on=3SG.PROX PROH=arrive.3SG
'Take and give her to a husband somewhere so I might not see her.' (lit., '. . . so my eyes may not arrive on her.') (04.43)

(294) *bi-ɐdɐb-i* ***m=ɔv!***
PRIV-mannerly-NMLZ PROH=2PL
'Don't be rude!' (TEX-0027.14)

4.1.3 Interrogative Mood

Interrogative mood is indicated primarily via rising-falling intonation. Pitch begins at a low level and rises on the question word, then drops back to low for any words following the

question word. When the question word is a single syllable, as in (295), it bears a single high pitch. However, when the question word is two syllables, the first syllable carries the high pitch, and the second drops to a low pitch, as seen in (296). Note that the beginning of the high pitch on the pitch trace for (296) does in fact correspond to the beginning of the question word, although it does not align precisely with the interlinearized example.



(295) L H L
ʂtər=ən *t͡sum* *kʊp?*
camel=POSS how.many hump
'How many humps do camels have?' (01.27)



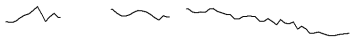
(296) L HL L L L
tɐw *t͡sət͡sɔxt* *ðəwʝd=ʊt* *jʊçk* *kər-k=i?*
2SG what.kind daughter=2SG learning do-PRS=SPEC
'What kind of wife will you give me?' (04.41)

This interrogative pitch contour is used regardless of the type of clause. Examples (295) and (296) are both verbal clauses. Although (297) is a nonverbal clause construction, it too exhibits the same interrogative pitch contour.



(297) L L HL
digɐ, *ɐw* *kumr?*
DISC 3SG.DIST where
'So, where is it?' (25.260)

Most polar questions are marked with a clitic (cf. §4.1.4). However, speakers do occasionally ask polar questions without such a clitic. In this case, the questioned constituent bears the high pitch, but otherwise the pitch contour is identical to that of content questions. An example of a such a question is given in (298). In this example, the questioned constituent is a non-finite light verb construction used as a purpose clause (*ʂtik t͡sərɐk* 'to play', lit., 'play do') The high pitch is on the both words of the purpose clause; the pitch drops on the final word of the utterance since it is not part of the content being questioned.

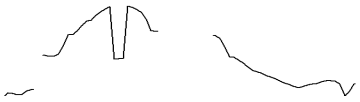


(298) H H L
ʂtik t͡sər-ɐk=ʊt wəz-g?
playing do-INF=2SG come-PRS
'You have come to play?' (03.27)

4.1.4 Polar Question Enclitic

In Afghan Wakhi, the sentence-final enclitic *=ɐ* can be used to mark polar questions in all tenses. Examples (299) – (303) show the polar question clitic used with the present, perfect, and past tenses, respectively. Since it is sentence-final, the polar question marker frequently attaches to verbs and copulas, as seen in (299) – (301), but it can also attach to other words. For example, in (302) it attaches to the word *nʊj* 'no' to form a tag question, and in (303) it attaches to an adjective functioning as a property predicate.[69] Polar questions formed with the enclitic *=ɐ* use the same rising-falling intonation as other types of questions, as the pitch trace given for (299) illustrates. Note that the beginning of the rising pitch (second pitch element) corresponds to the beginning of the negative proclitic *nʊ=* 'NEG', and the long falling pitch at the end all represents the speaker's intonation on the polar question enclitic.

[69] See §5.2.2.2 for a description of property predicates.



(299) *tu=t* *nʊ=jit-k=ɐ?*
2SG.NOM=2SG NEG=eat.PRF-PRS=Q
'Haven't you eaten (any)?' (6.20)

(300) *ti* *tɐt* *bʊ* *lingi* *vɐnd=ɐ?*
2SG.GEN father also turban fasten.3SG=Q
'Does your father also wear a turban?' (06.84)

(301) *jɐ* *kʊp=əʃ* *də* *kitɔb* *nʊwiʃtɐ* *tu=ɐ?*
3SG.DIST.GEN hump=PL.DFLT LOC book written COP.PST=Q
'Were its [a camel's] humps written in the book?' (01.29)

(302) *nʊj,* *wuz* *ɣɐl* *d͡zqlɐi,* *nʊj=ɐ?*
no 1SG.NOM still small no=Q
'No, I'm still young, am I not?' (02.44)

(303) *d͡zqlɐj=ʊt=ɐ?*
small=2SG=**Q**
'Are you young?' (06.101)

4.1.5 Imperfective Enclitic

Wakhi has a single purely aspectual marker: the enclitic =*ɾ* 'IPFV', seen below in (304) – (306).[70] I follow SanGregory (2015), Beck (2013), and Bashir (2009) in treating =*ɾ* as a marker of imperfective aspect. This imperfective clitic has different effects in different tenses. It can give a progressive reading in any tense, for example, past progressive in (304), and both perfect progressive and present progressive in (305). In the nonpast and past, it can also indicate a habitual activity, as in (306).[71] It is possible that these effects have more to do with the combination of *Aktionsart* and imperfective than with imperfective and tense. Further research

[70] In these data =*ɾ* 'IPFV' appears to be a second-position clitic. However, it can actually attach to any constituent in the clause, as described in SanGregory (2015).

[71] Although the use of the imperfective clitic in (304) may appear to be continuative, in the narrative context from which this example was taken, it clearly indicates a habitual action.

involving the classification of predicates by *Aktionsart* type and the addition of the imperfective is needed in order to better understand the interaction between lexical and morphological aspect.

(304) *jɐw=ʂ ki ɣɐ xʊʃruj bɐjt çɐt-i,*
3SG.DIST=IPFV COMPINTS pretty song say-PST

mɐzˌ=əʂ rʊqɔs-i kər-t.
1SG =IPFV dancer-NMLZ do-PST
'While he was singing so beautifully, I was dancing.' (21.04)

(305) *tu=ʂ fɐnd rʊt-k ki—*
2SG.NOM=IPFV lie give.PRF-PRS COMP

tu=ʂ mɐzˌ=i fɐnd rɐnd.
2SG.NOM=IPFV 1SG=ACC lie give.2SG
'You have been telling lies that—you are telling me lies.' (3.07)

(306) *tu=ʂ rɐ bʊ rʊt͡ʃ,*
2SG.NOM=IPFV down.to also go.2SG

zɐ=v=i=ʂ rɐ di.
child=PL.OBL=ACC=IPFV down.to hit.2SG
'You keep going down there and hitting the students down there.' (1.11)

The imperfective clitic can also occur with stative predicates in nonverbal clause constructions, as seen in (307) – (308). As I discuss in §5.2.2, a nonverbal clause construction that lacks a copula is interpreted as nonpast. According to Obrtelová, the imperfective clitic used in conjunction with a nonpast verb indicates "an ongoing action in the present, and marks the verb for 'presentness'" (2019: 57). From these data, it appears that the clitic has the same present effect when used with nonpast stative predicates.

(307) *jəm d͡ʒɐj=ʂ ki sʊkr.*
PROX place=IPFV all red
'This place is all red.' (25.70)

(308) *nʊj, nʊj, zi̯* *rəʝiiʂ=əʂ* *nʊ=wəz-g,*
no no 1SG.GEN beard=IPFV NEG=come-PRS

jʊt=əʂ *rip.*
MED=IPFV fur
'No, no, my beard hasn't come (in), that's peach fuzz [lit., 'fur'].' (02.17)

In §4.1.1 – §4.1.5, I have introduced several basic features that are common across the verbal system of Afghan Wakhi. These features include polarity proclitics, the pitch contour used for interrogative mood, a polar question enclitic, and an imperfective enclitic. With this basic foundation in place, I turn my attention to the three-stem verb system.

4.2. Overview: Three-Stem Verb System

Many Iranian languages exhibit a two-stem verb system in which one stem of a lexical verb is inflected for nonpast and the other for past (see, for example, Windfuhr & Perry 2009: 446 [Persian & Tajik]; McCarus 2009: 604 [Kurdish]; Jahani & Korn 2009: 659 [Balochi]; Robson & Tegey 2009: 738 [Pashto]). However, according to Edelman & Dodykhudoeva (2009: 782), a three-stem verb system (nonpast, past, and perfect) is common among the languages of the Pamir group. This system seems to be conservative, given that a verbal system with three stems has been reconstructed for Indo-European (Haig 2008: 42). Understanding this three-stem verb system is key to understanding Afghan Wakhi verbs.

Lorimer is the only linguist who describes Wakhi as having two "bases" (i.e., stems) (1958: 168–184); all others include a minimum of three. For example, Bashir analyzes Wakhi as having three primary stems for present, past, and perfect, as well as an ancillary causative stem (2009: 834).[72] Neither Shaw nor Morgenstierne mentions a causative stem, but both include an infinitive stem in their inventories alongside present, past, and perfect (Shaw 1876: 14;

[72] See §7.1.1 for a description of morphological causatives in Afghan Wakhi.

Morgenstierne 1938: 497–509). Grünberg & Stéblin-Kamensky include present, past, and perfect as primary stem types in their description, along with causative and pluperfect as secondary stems derived from the primaries (1988b: 48–53).

Although others describe the verbal system of Wakhi in terms of tense, Obrtelová (2019) describes it as aspect-based; accordingly, she uses different names for the different stems and verbal forms. I find her analysis of the functions of the different forms both insightful and largely similar to my own, and I refer interested readers to her analysis of the discourse structure of Wakhi narratives. However, I follow tradition in using tense-based labels for the different verb stems and their related forms (a) because I am not convinced that the collection of functions associated with each form merits the label "aspect," and (b) because maintaining the traditional labels facilitates comparison with other descriptions of Afghan Wakhi and related languages. I name each stem according to its primary or most prototypical function: nonpast (rather than present), past, and perfect.

Although some lexical verbs have three unique stems, many others have formal overlaps between two or more stems. For some verbs, all three stems are formally identical. That is, the nonpast stem is used to create infinitives, nonpast verbs, past verbs, and perfect verbs (both present perfect and past perfect) alike. Verbs with two stems exhibit two different patterns. For verbs that follow the first pattern, the nonpast stem is used to create infinitives, nonpast verbs, and perfect verbs, while the past stem is used only for past verbs. For verbs that follow the second pattern, the nonpast stem is used for infinitives and nonpast verbs, and the past stem is used for both past and perfect verbs. In verbs with three distinct stems, the nonpast stem is used to create infinitives and nonpast verbs; the past stem is used to create only past verbs; and the

perfect stem is used to create perfect verbs. Figure 4.1 illustrates the potential uses for the three verb stems.

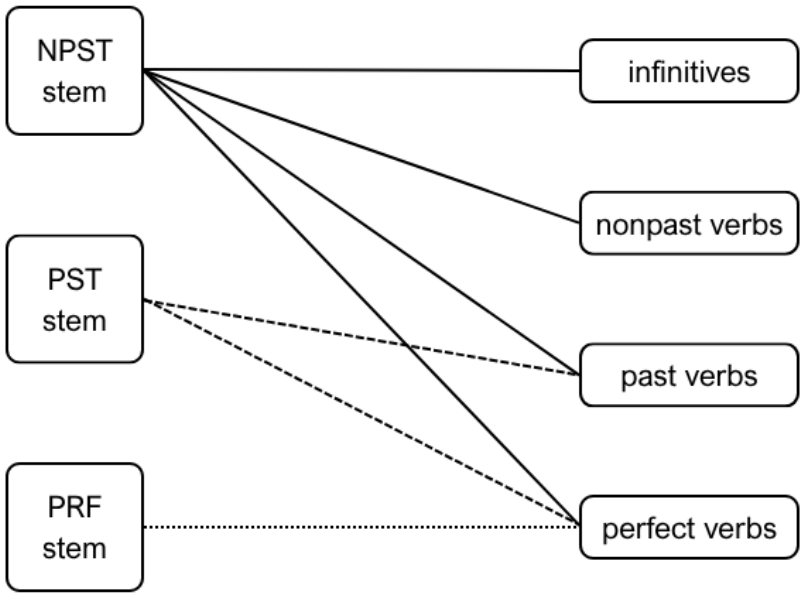


Figure 4.1. Verb stem types and possible uses in verb words

Table 4.2 displays examples of the stems for four lexical verbs that illustrate the four patterns of formal overlap between verb stem types. The type of formal overlap is listed in the first column; the remaining columns give the bare (uninflected) verb stem used to create different types of verb words. A more extensive list of verb stems can be found in Appendix A.

Table 4.2. Formal overlap between verb stem types

Formal Overlap	Infinitive	Nonpast	Past	Perfect	Stem Gloss
3 identical stems	*win*	*win*	*win*	*win*	'see'
identical NPST + PRF	*vɛnd*	*vɛnd*	*vɛs*	*vənd*[*]	'fasten'
identical PST + PRF	*dərz*	*dərz*	*dəz̨*	*dəz̨*	'take'
3 unique stems	*rʊt͡ʂ*	*rʊt͡ʂ*	*rəwj*	*rʊç*	'go'

[*] Many perfect stems exhibit vowel reduction due to word-final stress (cf. §2.3.2) but are otherwise identical to the nonpast stem.

Each verb stem type takes unique inflectional morphology and has functions specific to that stem. Figure 4.2 illustrates the relationships between different stems, the verb wordforms created from them, and the functions those wordforms may perform.

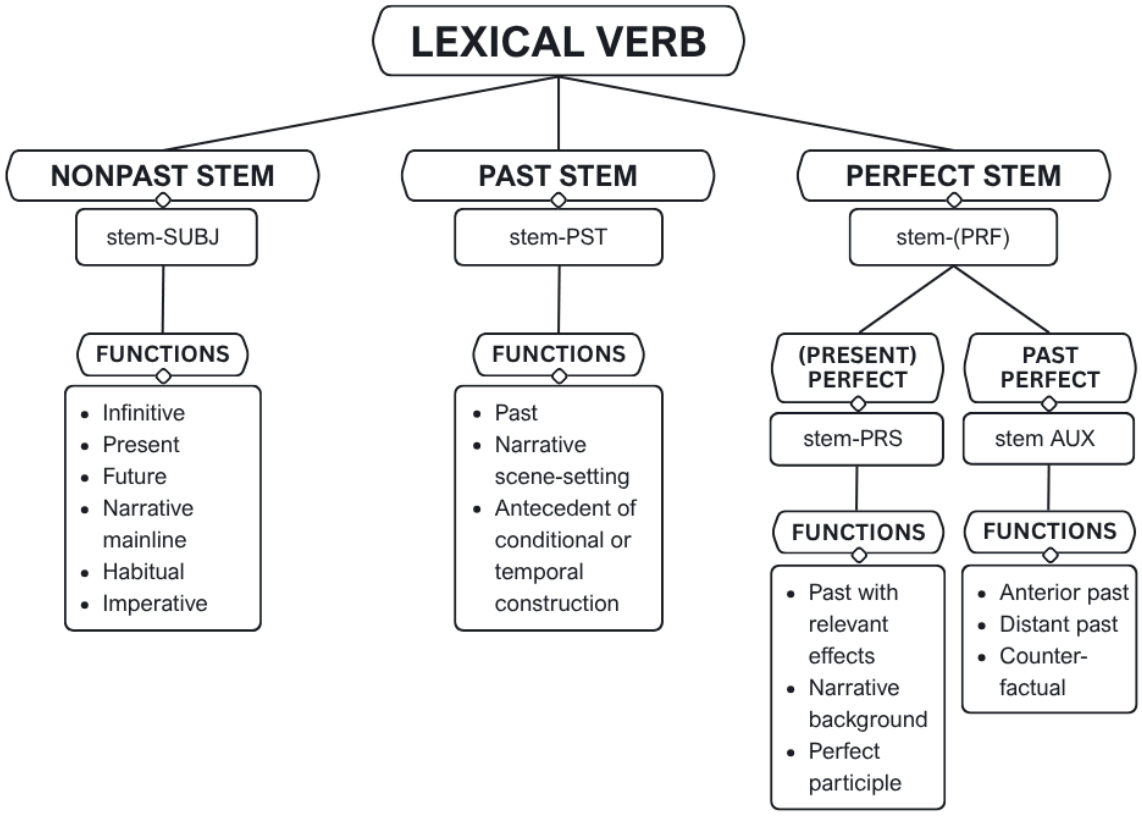


Figure 4.2. Lexical verb stem morphology and functions

In §4.3 – §4.5, I describe the morphology and functions depicted in Figure 4.2. I do not typically include the stem type as part of the gloss for any verb stem unless required in a specific example to clarify a point; usually the stem type is clear from additional morphology or auxiliaries that are part of the larger construction.

Clearly, many centuries of historical change have contributed to the patchwork quilt that is the Afghan Wakhi system of verb stems. I do not investigate the diachrony of the verbal

system in this dissertation, but I refer interested readers to Morgenstierne (1938) and Edelman & Dodykhudoeva (2009), who provide insight into its historical development.

4.3. Nonpast Stem

Having introduced the three-stem verb system, I now describe the nonpast verb stem. The nonpast stem is used to form finite nonpast tense verb words; it is also the stem used to form infinitives (cf. §3.2.1.2). The nonpast stem is the only stem that does not take morphology or auxiliaries that indicate the tense; it is also the only stem that takes inflectional subject-marking suffixes rather than clitics. Therefore, any verb word that has no tense gloss, but that does have subject-marking suffixes, should be interpreted as a nonpast verb.

4.3.1 Nonpast Morphology

Finite verbs formed using the nonpast stem are obligatorily inflected via a set of suffixes that index the subject of the clause. These subject-marking suffixes are similar, but not identical to, the subject-indexing enclitics described in §3.5. The full paradigm of subject-marking suffixes is compared to the paradigm of subject-indexing enclitics in Table 4.3.

Table 4.3. Subject-indexing suffixes vs. enclitics

	suffixes		**enclitics**	
person	**SG**	**PL**	**SG**	**PL**
1	*-əm*	*-ən*	*=əm*	*=ən*
2	*-Ø*	*-əv*	*=ʊt*	*=əv*
3	*-t, -d*	*-ən*	*=i*	*=əv*

As seen in Table 4.3, subject indexation includes three persons and two numbers for a total of six potential options. Although the subject-indexing enclitics and suffixes are very similar, they differ from each other in several ways. First, whereas the absence of a suffix indexes a 2SG subject on a nonpast verb stem (309), the enclitic *=ʊt* '2SG' serves this function in

other morphological contexts. Second, the enclitic *=i* '3SG' does not phonetically resemble its suffixal counterpart *-t ~ -d*; it is also used significantly less than the other subject-indexing enclitics. Finally, although the 3PL suffix is identical to the 1PL suffix *-ən*, the 3PL enclitic takes the same form as the 2PL clitic *=əv*.

(309) *tɐw=əʂ rəmi-əm də məktɐb*
2SG=IPFV send-1SG LOC school

ki tu rɐ ji t͡ʃiz jɔd ***dərz****.*
COMP 2SG.NOM down.to one thing memory take.2SG
'I send you to school so you will learn something down there.' (01.10)

The suffix *-əv* indexes a 2PL subject (310). Although speakers may use the 2PL as a polite form of address for a 2SG interlocutor, this use of the 2PL is quite rare. Example (311), which was addressed to me, is one of the few examples in my corpus of 2PL potentially used as a polite form of address. However, based on the discourse context in which (311) was uttered, it is possible that the speaker was actually referring to the organization for which I worked, in which case his use of the 2PL truly would be based on the number of referents, not politeness.

(310) *jɐn wɔz çɐt* ***win-əv*** *ʐi xərd͡ʒin=i* ***gɔt-əv****!*
then then self see-2PL 1SG.GEN saddlebag=ACC find-2PL
'So then you yourselves will see (that) you find my saddlebags!' (TEX-0025.05)

(311) *wɔz bʊ tɐʃɐkər-i t͡sʊ sɐv=ən ki sɐk=ən=əʂ xbɐr* ***dərz-əv****.*
DISC also thanks-NMLZ from 2PL.OBL=ABL COMP 1PL=ABL=IPFV news take-2PL
'So also thanks to you because you inquire about us.' (lit. 'So also thanks from you that you take news from us.') (TEX-0100.13)

Both 1PL and 3PL subjects are indexed by an identical suffix *-ən*. Both functions can be seen in (312): both verbs in the second clause index the 1PL.NOM pronominal subject *sɐk*, but the verb in the final clause indexes the third person subject *nəfɐr* 'person', which is understood as plural in this clause although it is unmarked for number. The 3PL can also used as a polite form when speaking of a respected singular referent; for example, I have heard the 3PL used to speak

about the district governor. Unfortunately, at this time I have no recorded examples of the honorific use of the 3PL in my corpus.

(312) *jəm də ji ku,*
PROX LOC one mountain

ɐ=tr=ʊt sɐk ***rʊʧ-ən*** *ɐ=ʧ=ɐ=nən* ***niçind-ən,***
EMPH=over.to=MED 1PL.NOM go-1PL EMPH=from=DIST=ABL pull.out-1PL

wɔz nəfɐr bʊ ziɔt ***rʊʧ-ən****. . .*
then person also a.lot go-3PL
'This [clay] is in a certain mountain, we go over and dig it out from there, then also people go a lot. . .' (TEX-0059.14)

Like the subject-indexing enclitics (cf. §3.5), the subject-marking suffixes exhibit nominative-accusative alignment. These suffixes always agree with the subject of the clause in person and number, regardless of whether it is the subject of an intransitive clause (313) or a transitive clause (314). In addition, these suffixes index the subject regardless of the type of NP that instantiates it. Thus subject indexation occurs when the subject is a nominal NP, as in (313); a pronoun, as in (314); or a null (elided subject), as in (315). Subject indexation does not depend upon the person or animacy status of the subject argument; as (316) demonstrates, an inanimate subject receives the same indexing as an animate one.

(313) NP_{SUBJ}
[*əm pɐrí*] *d=əm=ən* ***ɐl-d*** *drəm.*
PROX fairy COM=PROX=ABL stay-3SG at.PROX
'The fairy stays here with him.' (25.155)

(314) NP_{SUBJ} NP_{DO}
[*sɐjəʃ*] [*jɐw*] *mɐr* ***ʧɐlg-əv****.*
2PL.NOM 3SG.DIST 1SG.DAT want-2PL
'You (PL) request her for me.' (TEX-0003.15)

(315) NP_{SUBJ} NP_{DO}
∅ [*ruɲ*] ***wʊzʊm-d****.*
3SG oil bring-3SG
'(He) will bring oil.' (04.13)

(316) NP_{SUBJ} NP_{IO} NP_{DO}
[*ˌɐfˌʂ*] [*mɐr*] [*zib*] ***nʊ=rɐnd***.
hair 1SG.DAT beauty NEG=give.3SG
'Hair doesn't make me beautiful.' (lit., 'Hair doesn't give me beauty.') (06.79)

As shown in Table 4.3, the 3SG subject-marking suffix has two allomorphs, [-t] and [-d]. The choice of allomorph is conditioned by the final consonant of the verb stem: [-t] follows voiceless consonants, and [-d] follows voiced consonants and off-glides (cf. §2.2.2). Several examples of 3SG allomorphy are given in Table 4.4.

Table 4.4. Examples of allomorphy in the 3SG suffix

[-t]		**[-d]**	
gɔç-t	'he makes'	*dərz-d*	'he takes'
pɐt͡s-t	'she cooks'	*çɐn-d*	'she says'
kɐf-t	'it splits open'	*nɐw-d*	'he cries'
t͡ʃɐx-t	'it clucks'	*d͡ʒɔj-d*	'she reads'
kɐr̥-t	'he puts'	*xɐm-d*	'he descends'
t͡sɐr̥-t	'she does'	*wɐj-d*	'it howls'

Although cross-linguistic tendencies favor word-final devoicing, the attested form of the 3SG morpheme in Old Iranian was *-ti* (Skjærvø 2009: 91). Therefore, it seems more likely that the 3SG suffix underwent voicing instead. If the voicing of the 3SG suffix had chronologically preceded the liquid devoicing process, we would expect stem-final /r/ to retain its voicing, thereby conditioning the voiced [-d] allomorph of the suffix. Since we instead see stem-final /r/ devoicing to [r̥] before the [-t] allomorph (cf. the two final examples in the [t] column of Table 4.4), I conclude that liquid devoicing predated the voicing allomorphy of the 3SG suffix.

Verbs that have a stem-final vowel appear to take the [-t] allomorph of the 3SG suffix, which supports a reconstruction of the suffix as **-t*. However, most such verbs have a suppletive nonpast stem unique to the 3SG form, as shown in Table 4.5, which makes parsing constituent

morphemes difficult. In this dissertation, I treat such forms as unanalyzable and gloss them accordingly, for example, *jit* 'eat.3SG'.

Table 4.5. 3SG indexation on vowel-final stems

1SG		**3SG**	
jɐw-əm	'I eat'	*jit*	'he eats'
puv-əm	'I drink'	*pit*	'she drinks'
məri-əm	'I die'	*mirit*	'it dies'

I hypothesize that suppletive 3SG stems like those displayed in Table 4.5 are *t*-final and that the expected [-t] allomorph of the 3SG suffix is not pronounced because the phonology of Afghan Wakhi does not permit geminate consonants. The same prohibition of geminates can be seen on regular nonpast stems that end in [t] or [d]. For example, the nonpast stem of the verb meaning 'find' is *gɔt*, as seen in (317), which is inflected for 1SG subject marking. However, when used with a 3SG subject, the form used is not **gɔt-t*, but simply *gɔt*, as shown in (318). Similarly, the nonpast stem of the verb 'give' is *rɐnd* (319); its 3SG form is not **rɐnd-d*, but simply *rɐnd*, as seen above in (316).

(317) *digɐ, wuz ɐw t͡sət͡sɔxt* ***gɔt-əm****?*
DISC 1SG.NOM 3SG.DIST how find-1SG
'So, how do I find it?' (25.227)

(318) *ʊt də t͡ʃil ɔd͡ʒrɐ=i drən dʊst ʊt t͡ʃigɐsʊk=i tilɔ-i* ***gɔt****.*
and LOC forty brick=EZ deep inside MED shelf=EZ gold-ADJ find.3SG
'And inside the forty golden bricks he finds the golden shelf.' (25.413)

(319) *wuz ɐn tɐr ʐɐw* ***rɐnd-əm****.*
1SG.NOM then 2SG.DAT grain give-1SG
'Then I will give you some grain.' (05.16)

The subject-marking suffixes are used only on nonpast verb stems; they are never used on past or perfect verb stems. Similarly, they are never found on any copular forms except the subjunctive (cf. §5.1.1),[73] nor in nonverbal clause constructions that lack a copula.

4.3.2 Nonpast Functions

The nonpast stem is used for indicative clauses with both present and future meanings, as shown in (320) and (321), respectively. Nonpast verbal forms are used for mainline events in narratives (320), regardless of the understood time of the narrative events; they can also be used with a habitual function, as in (322). Future time may be indicated by the use of an adverbial like *sarək* 'tomorrow' in (321), but in contexts where a future time is clearly intended, no adverbial is needed, as in (323).

(320) ***ruʂt*** *çɐt də skɔrd dʊst çɐt* ***dʊʃt***.
go.3SG self LOC bridge inside self hit.3SG
'He himself goes and puts himself under the bridge.' (25.112)

(321) *ɐgɐr sɐrək jɐ mɐlim* ***wizit*** . . .
if tomorrow DIST teacher come.3SG
'If that teacher comes tomorrow . . .' (1.41)

(322) *spɔ mɐlim, jɐw çɐt tum ziɔt ɣɐjrɔzir-i* ***t͡sɐr-t***.
1PL.GEN teacher 3SG.DIST EMPH this.much a.lot absent-NMLZ do-3SG
'Our teacher, he himself is absent quite a lot.' (1.45)

(323) *ini wuz dər bɔrɐ=i xirgɔ tɐrək ji mɐlumət* ***rɐnd-əm***.
INTJ 1SG.NOM LOC regard=EZ yurt 2SG.DAT one information give-1SG
'So, I will give you a bit of information about yurts.' (TEX-0253.03)

Inflected nonpast verbs also function as imperatives. Imperatives are most commonly addressed to 2SG and 2PL speech act participants, as seen in (324) and (325), respectively. However, other persons may also be addressees in what are referred to as HORTATIVE

[73] The presence of a full subjunctive copular paradigm, plus the use of the regular nonpast subject-indexing suffixes in that paradigm, suggests that the synchronic subjunctive stem was the copula's original nonpast stem.

constructions (Auwera, Dobrushina & Goussev 2013). For example, (326) includes two 1PL hortatives, and (327) displays a 3SG hortative.

(324) *çɨ tɐsmim=i* ***wʊdər***
self.GEN decision=ACC grasp.2SG

ki tɐrək ɐrusi ***t͡sɐr-ən***
COMP 2SG.DAT marriage do-1PL
'Decide so we can perform your marriage.' (lit., 'Hold your decision so we can do marriage for you.') (02.36)

(325) *çɐnd:* *wuz=əm* *mərz* *vit-k,*
say.3SG 1SG.NOM=1SG hungry become-PRS

mɐr, *kɐm-ʊk=i* *çʊt͡ʃ* *mɐr* ***rɐnd-əv.***
1SG.DAT small-DIM=EZ bread 1SG.DAT give-2PL
'He says, "I'm hungry, to me—give me a little bit of food."' (25.218)

(326) *tər xun nɐg* ***rʊt͡s-ən, ɐrɐkɐt=ən,*** *ɐrɐkɐt* *t͡sɐr.*
over.to house direction go-1PL departure=1PL departure do.2SG
'Let's go home, let's leave, (you) head out.' (05.10)

(327) *xʊdɔ tɐw=i* ***nis-t!***
God 2SG=ACC disappear-3SG
'May God make you disappear!' (lit., 'May God disappear you!') (02.63)

4.4. Past Stem

Having described the verbal forms and functions associated with the nonpast stem, I now move on to the past stem. The past stem takes past tense marking, which I describe in §4.4.1. Although it is most prototypically used to refer to events that took place before the time of the utterance, the past stem has several additional functions, all of which are described in §4.4.2.

4.4.1 Past Morphology

Regular past verb stems are inflected via the past tense suffix *-ti* 'PST', which likely traces its origins back to the Old Iranian resultative participle marker *-ta* (cf. Haig 2008: 26, 117).

There are three allomorphs of the past tense suffix: [-ti], [-di], and [-ni]. Table 4.6 displays examples of verbs inflected with each form.

Table 4.6. Examples of allomorphy in the PST suffix

[-ti]		**[-di]**		**[-ni]**	
wɐʂ-ti	'fell'	*rəwʃ-di*	'went'	*wʊrʊʃ-ni*	'remained'
ɔf-ti	'knitted'	*nɐw-di*	'cried'	*t͡ʃər-ni*	'entered'
kəɻ-ti	'did'	*kɐn-di*	'laughed'	*kʂən-ni*	'heard'
jit-ti	'ate'	*xɐm-di*	'descended'	*ʂkən-ni*	'broke (ITR)'

The addition of a past tense suffix can theoretically produce a geminate consonant across a morpheme boundary; e.g.,{jit-ti} 'eat-PST'; {kʂən-ni} 'hear-PST'. However, as mentioned in §4.3.1, the phonology of Afghan Wakhi does not permit geminate consonants. Instead, geminates are simplified to a single consonant in actual production; e.g., [jiti] 'ate'; [kʂəni] 'heard'. In such cases, I parse the consonant as part of the verb stem and the word-final vowel as the remainder of the PST suffix; e.g., *jit-i* 'eat-PST'.

The most predictable of the past tense allomorphs is [-ti], which occurs following a voiceless consonant or a vowel. Although the [-ti] allomorph mostly occurs in unique environments, it does share one environment with [-ni]; namely, both allomorphs can occur following /r/, as seen in Table 4.6. As with the 3SG morpheme (cf. §4.3.1), a stem-final /r/ devoices preceding [-ti]. However, /r/ retains its voicing when followed by [-ni].

To my knowledge, [-di] is the only PST allomorph that occurs following off-glides or [m]. Otherwise, [-di] and [-ni] occur in many of the same environments, including following voiced consonants and the alveolar nasal.

Each of the past tense allomorphs exhibits some degree of overlap with at least one of the others. Given this overlap, it is impossible to completely predict which verb will use which

allomorph. Therefore, I categorize these three allomorphs as lexically conditioned rather than phonetically conditioned; i.e., the choice of allomorph largely follows phonological patterns, but it ultimately depends on the verb stem.

Up to this point, I have given all three allomorphs of the past suffix with a final vowel [i]. However, past tense verbs can also be produced without the final vowel; i.e., they may be produced simply as [-t], [-d], or [-n]. Examples of three words pronounced with and without the final vowel are given in Table 4.7.[74] Other linguists analyze the single-consonant form as the actual past tense suffix and the final vowel as a separate morpheme or phonetic addition (cf. Shaw 1876: 16; Lorimer 1958: 169; Grünberg & Stéblin-Kamensky 1988b: 49–50; Bashir 2009: 834; Hughes 2014: 62; Obrtelová 2019: 60–63). However, no one suggests a meaningful gloss for the proposed synchronic *-i* morpheme. In my own work, I have been unable to find any differences in meaning that correspond to the presence or absence of the final [i]; therefore, I currently treat it as part of the past tense morpheme, and I treat forms that lack the final [i] as reduced variants of the past tense suffix.

Table 4.7. Variants of the PST suffix with and without the final vowel

vowel	**no vowel**	
kəɻ-ti	*kəɻ-t*	'did'
rəwɟ-di	*rəwɟ-d*	'went'
wʊrʊɟ-ni	*wʊrʊɟ-ən*	'remained'

[74] For many verbs, such as the three in Table 4.7, the past form is distinguishable from the nonpast 3SG form because they use different stems. For other verbs, the PST and 3SG forms are identical when the final vowel [i] is omitted from the past; e.g., *pit* 'drink' could mean 'drink.3SG' or 'drink.PST' depending on the context.

4.4.2 Past Functions

In its most prototypical function, the past stem refers to an event that took place before utterance time. An example of this use of the past can be seen in (328). This example comes from a text in which the speaker describes the events leading to his engagement, which took place several years prior to the telling.

(328) *jəm tɔbistɔn tir* ***vit-i*** *ʊt*
PROX summer passed become-PST and

tirɐmɔ, kutʃ͡ *ʦ͡ʊ pɔmir=ən* ***xɐm-di*** *mizɔn miɟ.*
autumn migration from Pamir=ABL descend-PST Mizaan month
'The summer passed and in autumn, the migration descended from the Pamirs in the month of Mizaan.' (TEX-0003.44)

Another function of the past stem is to situate a story in the past before switching to the nonpast stem for the narrative mainline (cf. §4.3.2). Example (329), which contains three sequential sentences excerpted from the end of the introduction section of a folktale, illustrates this scene-setting function. These three sentences, like the five sentences before them (not included here), use solely past verb stems. The end of the introduction and the beginning of the narrative mainline is signaled by the switch from past to nonpast in (330).

(329) *jəm pɔtʃɔ, əm çɨ xɔr pʊtr=əʂ tumr dust nʊ=dəʐ-di.*
PROX king PROX self.GEN disfavored son=IPFV so.much love NEG=take-PST

rɐftɔr=i bɐf=əʂ nʊ=kər-ti.
behavior=EZ good=IPFV NEG=do-PST

bɐd=əʂ ɐw ***jut-i.***
bad=IPFV 3SG.DIST carry-PST
'This king, he didn't love his disfavored son very much. He didn't treat him well. He disliked him [lit., 'he took him badly'].' (25.006–25.008)

(330) *bilɔxirɐ, ji wɐxt pɔtʃɔ də jinʊk ʊt*
eventually one time king LOC sleep and

nɐjd jinɔt ***wind****.*
night dream see.3SG
'Eventually, one time the king is asleep and in the night he dreams [lit., 'dream sees'].' (25.009)

A past stem may also be used in the antecedent of a conditional construction or in a temporal clause that is situated in the future, as demonstrated by (331) and (332), respectively. This use of past stems in future clauses is common in Iranian languages; it functions to indicate a condition that must be met before the event referred to in the consequent (conditional construction) or the main clause (cf. Jahani 2017: 267; Obrtelová 2019: 62).

(331) *ɐgɐr sɐrək wɔz jɐ mɐlim mɐr ʃʊkɔjɐt* ***kər-ti,***
if tomorrow again DIST teacher 1SG.DAT complaint do-PST

jɐn wuz d=ɐ mɐlim prʊt tɐw ɣɐ di-məm.
then 1SG.NOM LOC=DIST teacher front 2SG INTS hit-1SG
'If tomorrow the teacher complains [lit., 'complained'] to me again, then I will really beat you in front of that teacher.' (01.50)

(332) *wuz=əm ki t͡s=ɐ nɐg bɔz t͡ʃigɐsʊk=i tilɔ-i=əm* ***gɔt-i*** *ʊt,*
1SG.NOM=1SG COMP from=DIST direction then shelf=EZ gold-ADJ=1SG find-PST and

digɐ, wəzi-əm, jund-əm.
DISC come-1SG carry-1SG
'When I have found the golden shelf, well, I will come and marry you.' (lit., 'When I found the golden shelf, then I will come and carry (you).') (25.150)

4.5. Perfect Stem

As described in §4.2 and illustrated in Table 4.2, verbs form four classes based on which stem type(s) are used to form which kinds of verb words. Concerning just perfect stems, there are three classes: (1) those for which the nonpast and perfect stems are identical; (2) those for which the past and perfect stems are identical; and (3) those for which the perfect stem is unique. Table 4.8 displays examples of verbs from each of these classes. The first column displays the stem

class, and the next three columns display the stems for the lexical verb with the gloss given in the final column.

Table 4.8. Perfect stem classes

class \ form	NPST	PST	PRF	Gloss
identical	*wʊzm*	*wɔzɔm*	*wʊzm*	‘bring’
NPST + PRF	*vɐnd*	*vɐs*	*vənd*[*]	‘fasten’
	di	*dʊʃ*	*di*	‘hit’
	kɐʈ	*kɐrt*	*kəʈ*	‘throw’
identical	*dərz*	*dəʐ*	*dəʐ*	‘take’
PST + PRF	*t͡sɐr*	*kər*	*kər*	‘do’
	wɔt͡s	*vit*	*vit*	‘become’
	kʂij	*kʂən*	*kʂən*	‘hear’
unique PRF	*gɔc*	*gɔc*	*çʊt*	‘do, make’
	nʊzd	*nəjn*	*niən*	‘sit’
	ðit͡s	*ðəj*	*ðʊç*	‘milk’
	rʊʈ͡ʂ	*rəwj*	*rʊç*	‘go’

[*] The [ɐ] in a nonpast stem reduces to schwa in the perfect stem as a result of the change from word-initial to word-final stress (cf. §2.2.3).

Verbs that belong to the first stem class (i.e., those for which the nonpast and perfect stems are identical) take the obligatory suffix *-ʊt* ‘PRF’ to form an inflectable perfect stem. This suffix likely traces back to the Old Iranian resultative participle marker *-ta* (cf. Haig 2008: 26; Skjærvø 2009: 93–94).[75] It creates a verb word that may be used without further inflection (333) or that may serve as the stem used for further affixation (334), depending on the type of perfect.

[75] In Old Persian, a construction containing a resultative participle formed with *-ta* was reanalyzed as the finite past tense, which led to the development of tense-based split ergativity (Haig 2008: 85). Presumably, Afghan Wakhi inherited both the original function of the resultative participle and the reanalyzed past tense function. Thus we find similar synchronic forms: *-ti* ~ *-di* ‘PST’ and *-ʊt* ‘PRF’.

Since stems from the other two classes are used the same way, just without *-ʊt* ((335) – (336)), I analyze forms with *-ʊt* as perfect stems on the same level as the other classes of perfect stems.

(333) *də ji d͡ʒɐj ji vɐjt͡ʃ də ji miz sɐr jɔd-**ʊt** tu.*
LOC one place one jug LOC one table head leave-PRF COP.PST
'In one place, a jug had been left on top of a table.' (21.08)

(334) *mɐlim tɐr fɐnd-**ʊt**-k.*
teacher 2SG.DAT lie-PRF-PRS
'The teacher has lied to you.' (01.15)

(335) *mɐlim tɐw=i fɐnd **rʊt**-k.*
teacher 2SG=ACC lie give-PRS
'The teacher has lied to you.' (01.35)

(336) *wuz=əm **rʊç**-k.*
1SG.NOM=1SG go-PRS
'I have gone.' (02.66)

As Comrie (1976: 52) observes, the perfect is not rightly an aspect in the same sense as other aspects because it does not provide information about the internal structure of an event. Neither is it a prototypical tense that situates an event in time with respect to the time of the utterance (Comrie 1976: 2; Givón 2001a: 285). Rather, the perfect is prototypically used for a past action with ongoing relevant effects (Comrie 1976: 52; Bybee, Perkins & Pagliuca 1994: 61; Givón 2001a: 293); as such, it is sometimes considered a relative tense (Givón 2001a: 286–287). Cross-linguistically, perfects are not monolithic, but can come in different "flavors" depending on the reference time to which it is anchored—past, present, or future (Comrie 1976: 53; Givón 2001a: 293).

In Afghan Wakhi, the perfect stem is used to create two different perfect-type verb words: the present perfect (§4.5.1) and the past perfect (§4.5.2). I follow Comrie (1976: 53) in using the simple label "perfect verb" to refer to verbal wordforms with present perfect

morphology and functions. A "perfect verb" therefore should not be confused with the "perfect stem," upon which both perfect and past perfect verb words are built.

4.5.1 Perfect

The first of the two subtypes of perfect created with the perfect stem is the (present) perfect. In §4.5.1.1, I describe the suffix used to form perfect verbs. The functions of perfect verbs are the topic of §4.5.1.2.

4.5.1.1 Perfect Morphology

Perfect verb words are formed from the perfect stem of a given verb (which may include the suffix *-ʊt* 'PRF', cf. §4.5.1) plus an additional suffix, which I refer to as the "present perfect suffix" and gloss 'PRS'.[76] The present perfect suffix has two allomorphs: [-k] and [-g]. The alternation in the PRS suffix is conditioned wholly by the voicing of the stem-final consonant; i.e., the voiceless allomorph follows voiceless consonants, and the voiced allomorph follows voiced consonants. Table 4.9 gives examples of both allomorphs.

Table 4.9. Examples of allomorphy in the PRS suffix

[-k]		**[-g]**	
winʊt-k	'has seen'	*wəz-g*	'has come'
rʊç-k	'has gone'	*dəʐ-g*	'has taken'
jit-k	'has eaten'	*kʂən-g*	'has heard'
lʊkəɻ-k	'has remained'	*ʂkən-g*	'has broken (ITR)'

[76] According to Morgenstierne, the present perfect suffix traces back to **-aka* (1938: 506). Unfortunately, he provides no further information about the origin or meaning of this reconstructed suffix.

4.5.1.2 Perfect Functions

Perfect verbs have two primary functions. First, they may denote a past action with ongoing implications for the present. An example of this function is seen in (337), from which we understand that the mythical woman's hair has been—and at this point in the story, remains—fastened inside forty bricks. Second, perfect verbs are used to encode background information in a narrative. For example, the first clause in (338) is part of the narrative mainline, and as such is told using nonpast verbs (cf. §4.3.2). However, the narrator switches to a perfect verb in the second clause as he relays background information that is not part of the mainline.

(337) *t͡ʃilgɐzmɐk t͡ʃilgɐzmɨj, əm ʂɐfʂ əm=ən də t͡ʃil ɔd͡ʒrɐ=i drən*
forty.meter.neck forty.meter.hair PROX hair 3SG.PROX=POSS LOC forty brick=EZ deep

di-ʊt-k, ***vənd-ʊt-k.***
hit-PRF-PRS fasten-PRF-PRS
'As for the forty-meter-necked, forty-meter-haired lady, her hair (lit., 'this hair of hers') has been put in forty deep bricks and fastened.' (25.300)

(338) *jɐrk=əʂ t͡sɐr-ən, diwɔl=əʂ di-nən, də ji d͡ʒɐj.*
work=IPFV do-3PL wall=IPFV hit-3PL LOC one place

bɔz t͡ʃigɐsʊk=i tilɔ-i=əv ***nʊ=gət-ʊt-k,*** *xʊj?*
then shelf=EZ gold-ADJ=3PL NEG=find-PRF-PRS INTJ
'They are working; they are building a wall at a certain place. Then, they haven't found the golden shelf, okay?' (25.452-25.453)

In addition to their verbal function, inflected perfect verb words also function as perfect participles. That is, they can serve as deverbal nouns and adjectives. The perfect participles in the first and third lines of (339) (*kɨng* 'plucking' and *ding* 'hitting' [i.e., erecting]) are both examples of deverbal nouns. The word *ʂkəng* 'broken' in (340) functions as a deverbal adjective that, in this clause, serves as a nonverbal predicate (cf. §5.2.2.2).

(339) *nʊ də* ***kɨn-g*** *diʃ-t ʊt,*
NEG LOC pluck-PRS know-3SG and

nʊ ɐw vər=əʂ diʃ-t ʊt,
NEG 3SG.DIST load=IPFV know-3SG and

nʊ ɐw bərɔdɐr=i gʊl ***di-n-g*** *diʃ-t.*
NEG 3SG.DIST brother=EZ flower hit-PRF-PRS know-3SG
'Neither does he know how to take it [a yurt] down, nor does he know its loading, nor brother dear does he know its putting up.' (TEX-0118.43)

(340) *jəm ruj=əʂ kɨ* ***ʂkən-g****.*
3SG.PROX face=IPFV all break-PRS
'His face is all torn up (lit., broken).' (Wolf Attack 16)

4.5.2 Past Perfect

Like perfect verbs, past perfect verbs are formed from the perfect stem. Unlike the other verb forms (nonpast, past, and perfect), which are all formed via suffixes, the past perfect is a verbal construction consisting of the perfect stem plus an auxiliary. I describe this construction in §4.5.2.1. In §4.5.2.2, I explain and provide examples of the different functions associated with the past perfect.

4.5.2.1 Past Perfect Construction

The past perfect is formed using a perfect stem followed by the auxiliary *tu* 'COP.PST', as seen in (341) and (342). These examples demonstrate that the voiceless allomorph of the present perfect suffix (*-k*) is not used as part of the past perfect construction (341), but the voiced allomorph (*-g*) is (342). Presumably, the *-k* allomorph is deleted to simplify the [kt] sequence that would otherwise obtain across the word boundary.

(341) *tɐqribɐn du ɐzɔr o duɔzdɐ tu, ɐ=tum tu*
approximately two thousand and twelve COP.PST EMPH=so.much COP.PST

ki sɐk=ən jɐrk ʃəru t͡sʊ ***kər tu.***
COMP 1PL.NOM=1PL work start FACT do COP.PST
'It was approximately 2012, it was then that we started the work.' (TEX-0132.04)

(342) *ʐɨ sɐr ɣɐ ziɔt* ***wəz-g tu,***
1SG.GEN head INTS a.lot come-PRS COP.PST

jɐn ʐɨ tɐt ʐɨ sɐr kɐl kər-ti.
then 1SG.GEN father 1SG.GEN head bald do-PST
'My hair had grown a lot [lit., 'had come a lot'], [so] then my father shaved my head.' (06.02)

4.5.2.2 Past Perfect Functions

The past perfect has three primary functions. First, it can indicate that an event is situated in the past relative to another past event; i.e., it indicates anteriority (cf. Bybee, Perkins & Pagliuca 1994: 54). An example of this anterior function is seen in (343). In this utterance, the speaker uses the past perfect in the first clause to situate the time of her command as taking place before the time when her daughter started playing.

(343) *xɐj, wuz=əm tɐr t͡ʃiz=i nʊ=****çɐt*** ***tu,***
INTJ 1SG.NOM=1SG 2SG.DAT thing=SPEC NEG=say.PRF COP.PST

ki tu rʊt͡ʂ, məl=v=i ðit͡s.
COMP 2SG.NOM go.2SG flock=PL.OBL=ACC milk.2SG

tɐw wəz-g, ʂtik=ʊt ʃəru kər-k.
2SG come-PRS playing=2SG start do-PRS
'Well, had I not said something to you, that you (should) go milk the flocks? (But) you have come and started playing.' (03.29-03.30)

Second, the past perfect may be used to refer to an event from the distant past. This function is seen in (344), which concludes a fictional narrative told as a reminiscence.

(344) *jɐn ɐ=ʐɨ dʊstkɐwl=əv t͡sʊ tɐw=ən **zʊt** **tu,** ɔxir.*
then EMPH=1SG.GEN purse=3PL from 2SG=ABL grab.PRF COP.PST end
'Then they grabbed my purse from you, at the end.' (10.09)

Finally, the past perfect is used for counterfactual constructions. In such constructions, the verbs of both the antecedent clause and the consequent clause occur in the past perfect. The contrafactual function of the past perfect is illustrated by (343), (345), and (346); the latter two are successive sentences from the same humorous story.

(345) *ini mʊlɔ rɔst çɐn,*
INTJ mullah right say.2SG

*ini niv əm ʂɐr t͡sərəng **çʊt** **tu**?*
INTJ now PROX city how do.PRF COP.PST
'See here Mullah, speak truthfully. Here now, what would you have done to this city?' (TEX-0025.07)

(346) *xʊj, ʐɨ d͡ʒɐwɔl=əm=əʂ **çʊt** **tu** xərd͡ʒin.*
INTJ 1SG.GEN sack=1SG=IPFV make.PRF COP.PST saddlebag
'Well, I would have made my grain sack into a saddlebag.' (TEX-0025.08)

The Afghan Wakhi verbal system is built upon a set of three verb stems: nonpast, past, and perfect. In §4.3–§4.5, I have described each stem, the morphology and / or constructions associated with it, and the set of functions allocated to it within the larger system. This elegant (if complicated) system provides speakers of Afghan Wakhi with many different ways of describing actions and events and locating them in time.

4.6. Summary

In this chapter, I have provided an overview of verbal predication in Afghan Wakhi. Although the language does not have a large class of verb words, the verbs it does have are part of a system that is as beautiful as it is complex. Basic features found across the verbal system include different sets of clitics that indicate negative polarity and mood, mark polar questions,

and specify imperfective aspect. In addition, the same high-falling intonation pattern is used to mark interrogative mood regardless of the verbal stem type used in a given clause.

Like other Pamir languages, Afghan Wakhi is conservative in maintaining the three-stem verb system inherited from Old Iranian, which itself traces back to Proto-Indo-European (cf. Edelman & Dodykhudoeva 2009: 782; Haig 2008: 42; Skjærvø 2009: 87–89). Each of the three verb stems, nonpast, past, and perfect, has its own dedicated set of morphology and functions. The nonpast stem is so named because it is used in both present and future contexts. Verb words formed from the nonpast stem are inflected via an obligatory set of subject-marking suffixes; the nonpast is unique among the verb stems in using these suffixes rather than the subject-indexing clitics. The past stem is inflected via the suffix *-ti* ~ *-di* 'PST'; it is used not only to refer to events that took place before utterance time, but also to set the time for a narrative, as well as to mark a condition that must be met before a following action or event can take place. The perfect stem serves as the base for two subtypes of perfects, the (present) perfect and the past perfect. Perfect verbs can be used either to refer to an event that has ongoing implications in the present, or to encode background information in a narrative; they are formed by adding the suffix *-k* ~ *-g* 'PRS' to the perfect stem. The past perfect is conveyed by a construction that uses a bare perfect stem in conjunction with an auxiliary. The past perfect can be used (a) to indicate that an event is situated in the past relative to another past event; (b) to refer to an event from the distant past; or (c) to form a contrafactual construction.

CHAPTER 5

NONVERBAL PREDICATES

When discussing predication, lexical verbs may be the most prototypical type of predicate that comes to mind; however, that is not the only kind of predication. Other lexical categories, such as noun phrases, adjective phrases, and adverbials, can also function as semantic predicates in constructions that predicate "concepts other than action concepts" (Croft 2022: 289). Various authors disagree about the nature of such constructions. For example, Haspelmath (2025: 2, 5) calls them "nonverbal clause constructions" because he contends that they do not involve predication at all. In contrast, Overall *et al.* (2018: 2) use the term NONVERBAL PREDICATION to reflect that "the nucleus of the predicate [in such constructions] is a nonverbal element." In this dissertation, I follow Overall *et al.* in both analysis and terminology; therefore, I refer to predicates that are not lexical verbs as "nonverbal predicates." In addition, I use "nonverbal predicate construction" to refer to a clausal construction comprising a nonverbal predicate and its argument(s).

In this chapter, I present a structural and functional description of the different types of nonverbal predicates in Afghan Wakhi. Since all types of nonverbal predication require a copula in negative polarity clauses or with verb forms other than the nonpast, I begin with copular forms and functions in §5.1. I describe nonverbal predicates in §5.2, which is further subdivided according to basic vs. marked constructions. Within each section, I provide examples of the different structures available and correlate each structure with the function(s) for which Afghan Wakhi speakers use them. In §5.3, I summarize the different types of nonverbal predicates and functions that I have identified.

5.1. Copular Forms and Functions

A copula is a word that links a subject and a predicate without contributing much in terms of semantics or argument structure (Hengeveld 1992: 73; Creissels, Bertinetto & Ciucci 2026: 4). While some languages have verbal copulae, i.e., linkers that are derived from verbs (often posture verbs) and that share the same inflectional and grammatical properties as verbs, other languages have copulae that cannot be classified as full or "normal" verbs. Some nonverbal copulae are grammaticalized forms of pronouns, demonstratives, or topic markers, while others are invariant particles of untraceable origin (Stassen 1997: 76, 85; Croft 2022: 295; Overall, Vallejos & Gildea 2018: 4).

Understanding the copulae of Afghan Wakhi is foundational to understanding nonverbal clause constructions. Therefore, the next two sections focus on the copulae of Afghan Wakhi. Section 5.1.1 is devoted to the primary copula, and §5.1.2 to two additional copulae that are used for inceptive and inchoative predicates.

5.1.1 The Copula *tʊjɐk*

Afghan Wakhi has one generic copula, *tʊjɐk* (morphologically: *tʊj-ɐk* 'be-INF'). The closest literal meaning of this copula is 'to be'; however, I gloss it simply as 'COP' because it is used in a wide variety of constructions, as will be demonstrated in the following sections. The Afghan Wakhi copula is a verb with a defective nonpast paradigm, a suppletive past form, and a unique subjunctive paradigm. In the nonpast, the copula has distinct, invariant forms for both affirmative and negative polarity. Like many other verbs (cf. §4.2), the copula has a suppletive, affirmative-polarity past tense stem that is negated via the regular negative proclitic *nʊ=* 'NEG' (cf. §4.1.2). I gloss the affirmative nonpast form *tʊj* simply as 'COP', but I gloss all other forms as portmanteau morphemes; e.g., *tu* 'COP.PST'; *nɐst* 'COP.NEG'. The past form of the copula (*tu*)

serves as the stem for the perfect tense. The nonpast, past, and perfect forms of the copula (both affirmative and negative) are displayed in Table 5.1. Two examples of the copula in the perfect can be seen in (347). In this example, the first clause is an existential clause (§5.2.2.4), and the second clause is an identity clause (§5.2.2.1).

Table 5.1. Basic copular tense and polarity forms

	affirmative	**negative**
nonpast	*tʊj*	*nɐst*
past	*tu*	*nʊ=tu*
perfect	*tu-ʊt-k*	*nʊ=tu-ʊt-k*

(347) *ji ðɐj* ***tu-ʊt-k,***
one man COP-PRF-PRS

ɐw nung=i ***tu-ʊt-k*** *bɔbɔ t͡ʃɐɣɐndi.*
3SG.DIST name=3SG COP-PRF-PRS Baba Chaghandi
'There was a man, (and) his name was Baba Chaghandi.' (TEX-0249.04)

While the nonpast forms of the copula are suppletive particles, the subjunctive paradigm is fully verbal. The copula is the only Afghan Wakhi verb that has a subjunctive stem. Although the copula normally does not inflect for subject marking, it obligatorily indexes the subject in the subjunctive using the same suffixes that mark subject indexation on other nonpast verbs. The subjunctive paradigm for the copula (with subject indexation shown) is given in Table 5.2.

Table 5.2. Subjunctive copular paradigm

	singular	**plural**
1	*ʊmi-əm*	*ʊmi-ən*
2	*ʊmi*	*ʊmi-əv*
3	*ʊmʊ-t*	*ʊmi-ən*

The copula *tʊjɐk* also has a special form *t͡sʊj*, which has two apparent functions. First, it seems to function as a subjunctive particle in subordinate clauses, as seen in (348) and (349). Clauses such as these are usually hypothetical and can be translated with "if," even if the word *ɐgɐr* 'if' is not included. In this subordinate subjunctive function, *t͡sʊj* occurs clause-finally after the main lexical verb, which is fully inflected.

(348) *ʊt digɐ, wuz rʊʈ͡ʂ-əm* ***t͡sʊj,***
and DISC 1SG.NOM go-1SG SBJV.COP

ɐw mɐz̩=i zɐr t͡sɐr-t.
3SG.DIST 1SG=ACC injured do-3SG
'And so, should I go, he [the red ogre] will hurt me.' (25.0078)

(349) *tu rʊʈ͡ʂ,*
2SG.NOM go.2SG

ji winʊk jɐw ***t͡sʊj,***
one marmot eat.2SG COP.SBJV

əm d͡zi kɨn, kɨn,
PROX way dig.2SG dig.2SG

kɨndɐr tɐw bʊlt ***t͡sʊj.***
pit 2SG knock.down.3SG COP.SBJV
'(If) you go perhaps to eat a marmot, (and) you dig and dig like this, (and) the pit should collapse (on) you.' (25.513)

Second, this form of the copula can indicate factuality; i.e., a situation that the speaker takes for granted as true or historical fact. Like the subordinate subjunctive auxiliary shown above, it may occur clause-finally in conjunction with a main verb, as shown in (350). However, as (351) illustrates, it may also stand alone in a nonverbal clause construction. The factual function of this copular form is more commonly attested in my corpus than is the subordinate subjunctive function.

(350) *wuz* *ɐ=jɐ* *t͡ʃiz* *ʂkurg-əm*
1SG.NOM EMPH=DIST thing search-1SG

ki *tɐw* *ɐw* *mɔʃ-ti* ***ts͡ʊj***.
COMP 2SG 3SG.DIST hide-PST COP.FACT
'I am searching for the thing that you hid.' (22.11)

(351) *də* *zɐç* *ruj* ***ts͡ʊj***.
on thorn face COP.FACT
'(They) are on the thorns (lit., 'on the face of the thorns').' (06.55)

5.1.2 Other Copulae

The verb *wɔt͡sɐk* 'to become' is used as a copula instead of *tʊjɐk* for inceptives and inchoatives, as seen in (352) and (353), respectively.[77] The verb *ʝirɐk* 'to turn' is also occasionally for inchoatives, as in (354).

(352) *wɐxt=i* *ki* *də* *ʂkurg-ʊk=ʊt* ***vit-i*** . . .
time=SPEC COMP LOC search-INF=2SG become-PST
'When you started searching . . .' (lit., 'When you at searching became . . .') (22.09)

(353) *ɐw* *ɣɐ* *xʊʃ* ***wɔst***.
3SG.DIST INTS happy become.3SG
'She will become very happy.' (25.277)

(354) *jəm* *dənjɔ* *ji* *lɔj* *sʊkr* ***ʝir-d***.
PROX world one time red turn-3SG
'This world will turn red once.' (25.103)

In §5.1.1 – §5.1.2, I have described the forms of the copulae found in Afghan Wakhi. I have shown that the copula *tʊjɐk* has a complete subjunctive paradigm supplemented by suppletive particles for nonpast tense and polarity functions. Two other verbs, *wɔt͡sɐk* 'to become' and *ʝirɐk* 'to turn' can also function as copulae for inceptive and inchoative

[77] Inceptives may also be formed using the light verb construction *fəru t͡sərak* 'to begin.' Regardless of the strategy used to create an inceptive, the action that is beginning is always subordinated in a non-finite complement clause, as seen in (350).

constructions. These descriptions lay the foundation for understanding nonverbal predicates, which I describe in the remainder of the chapter.

5.2. Nonverbal Predicates and Associated Functions

Having described the copulae of Afghan Wakhi in §5.1, I now turn my attention to nonverbal predication. In nonverbal predication, a word or phrase other than a verb functions as the semantic predicate of the clause. Such clauses predicate "concepts other than action concepts" (Croft 2022: 289); they are commonly categorized and named according to the word class of the predicate and their semantic function. The most common candidates for nonverbal predicates are noun phrases, adjective phrases, and adverbials (Overall, Vallejos & Gildea 2018: 3; Haspelmath 2025: 2–4; Creissels, Bertinetto & Ciucci 2026: 3, 5). Nonverbal predicates in different languages may or may not also include some kind of semantically vacuous or grammatically defective verb or copula to contribute grammatical information (Hengeveld 1992: 73; Overall, Vallejos & Gildea 2018: 2; Haspelmath 2025: 2, 6–7).

This section is divided into three parts. In the first part (§5.2.1), I define the seven functional types of nonverbal predicates that I make reference to in this dissertation. In the second part (§5.2.2), I address basic nonverbal predicates; i.e., nonverbal predicate constructions that are unmarked in terms of grammar and frequency. In the third and final part (§5.2.3), I describe constructions that are marked at the very least in terms of grammar, and in most cases also in terms of frequency. Section 5.2.2 and §5.2.3 are organized structurally, with a description of each type of nonverbal predicate construction accompanied by examples of the predicative functions associated with it. In both, I focus on stative nonverbal clause constructions formed with the basic copula *tʊjɐk* (cf. §5.1.1), regardless of whether the copula is an optional or

obligatory constituent of the construction at hand; I leave an in-depth description of inceptive and inchoative constructions for future investigation.

In Afghan Wakhi, a subject-indexing enclitic (cf. §3.5) may optionally occur in any nonverbal clause construction except one with a subjunctive copula. For example, (355) includes a subject-indexing enclitic, but (356) does not. I have not identified any consistent semantic differences between nonverbal clauses that contain a clitic vs. those that do not.[78] Since I cannot pinpoint any crucial meaning contributed by a subject-indexing clitic, I do not currently include it as a constituent in any nonverbal predicate construction.

(355) *məktɐb-i=əm tʊj, ɔ.*
school-NMLZ=1SG COP yes
'I'm a student, yes.' (06.006)

(356) *wuz ɣɐl kudɐk.*
1SG.NOM still small.child
'I'm still a kid.' (02.21)

5.2.1 Overview: Functional Types of Nonverbal Predicates

Typologists identify anywhere from three to seven different functional types of nonverbal predicates; although the number of categories and the names they use vary, they nevertheless coalesce around the same general predicate types and functions. In this section, I compare the typologies proposed by five different authors. Table 5.3 provides a visual representation of the alignment and overlap between these different typologies.

[78] Hughes (2014: 147–162) at one time hypothesized that the subject-indexing clitics secondarily function as focus markers; however, the results of his tests were inconclusive.

Table 5.3. Typologies of nonverbal predicates

Predicate	Stassen (1997)	Creissels *et al.* (2026)	Hengeveld (1992)	Haspelmath (2025)	Overall *et al.* (2018)
Nominal	∅	identity	identification	equational	identity
	class	inclusion	classification	classificational	categorization
Adjectival	property		property assignment	attributional	perm. property
					temp. property
Adverbial	location	locational / existential	location	predlocative	locative
Existence			existence	existential	existential
Possession		possessive	possession	predpossessive	possessive
				appertentive	

Nominal predicates are typically identified as having functions related to identity and classification. Stassen (1997: 12–13) excludes identification from being a type of predication, which leaves only the function of classification for nominal predicates; the other authors surveyed here all further subdivide nominal predicates into two functional categories. In some clauses with nominal predicates, such as, *The Morning Star is the Evening Star*, the subject is equated with the predicate. Hengeveld (1992: 81), Overall *et al.* (2018: 6), and Creissels *et al.* (2026: 15) use the term IDENTITY for clauses of this type, while Haspelmath calls this category EQUATIONAL (2025: 1–3). Other nominal predicates express inclusion of the subject within a broader class, for example, *His son is a business major*. Hengeveld (1992: 81) and Haspelmath (2025: 1–3) both call this function CLASSIFICATIONAL; Overall *et al.* (2018: 6–7) refer to it as CATEGORIZATION, and Creissels *et al.* include it in their category of INCLUSION predicates, which spans across nominal, adjectival, and adverbial predicate types (2026: 14).

Overall *et al.* describe adjectival predicates as predicates that "typically attribute properties to the subject" (2018: 7). Although most of the typologists surveyed here treat

nonverbal clauses with adjectival predicates as a single cohesive category, they use varying terms for it, such as ATTRIBUTIONAL (Haspelmath 2025: 1, 3), PROPERTY CONCEPT or PROPERTY ASSIGNMENT (Hengeveld 1992: 116; Stassen 1997: 13–17, respectively), and INCLUSION (Creissels, Bertinetto & Ciucci 2026: 14). However, in recognition of the fact that some languages use different grammatical structures to indicate the difference between permanent and temporary properties (Stassen 1997: 15–17; Overall, Vallejos & Gildea 2018: 7–8), Overall *et al.* subdivide clauses with adjectival predicates into two types. PERMANENT PROPERTY predicates are those such as *Lake Superior is deep*, in which the property attributed to the subject is stable across time, while TEMPORARY PROPERTY predicates, such as *My cat is hungry*, are those in which the property is not time-stable.

Nominal and adjectival predicates are much easier and cleaner to tease apart than the other types of nonverbal predicates displayed in Table 5.3, which often have structural similarities. These are typically identified as LOCATIVE, EXISTENTIAL, and POSSESSIVE predicates. A locative predicate is an adverbial constituent of some sort (e.g., a locative adverb or adpositional phrase, or in some languages, a noun phrase used as a locative (cf. §5.2.2.3)) that asserts the location of a definite subject in a concrete, physical space (Hengeveld 1992; Stassen 1997; Overall, Vallejos & Gildea 2018; Haspelmath 2025; SanGregory 2025a: 270). The sentence *The milk is at the house* is an example of a prototypical locative clause. In contrast, existential clauses, such as *There is milk in the fridge*, lack a true predicate even though many of them do in fact include a locative word or phrase. In spite of their name, the primary function of existential clauses is to introduce a new participant into the discourse; secondarily, they may be used to express the existence or availability of a participant or object (Hengeveld 1992; Givón 2001b; Gaeta 2013; Overall, Vallejos & Gildea 2018; SanGregory 2025a: 271). It is useful to

refer to the constituents of an existential clause as the FIGURE and GROUND, where the figure is the constituent being introduced, and the ground is the (sometimes optional) locative phrase used to locate the figure in space (Talmy 1975; Talmy 2000; Levinson & Meira 2003; Danziger 2010; Creissels 2019; Croft 2022).

In some languages, there is no formal distinction between locative and existential clauses; linguistics typically describe such languages as having a single LOC-EX construction that exhibits grammatical differences conditioned by pragmatics (cf. Creissels 2019; Panova & Liljegren 2025; SanGregory 2025a; Creissels, Bertinetto & Ciucci 2026). Of the typologists surveyed in this dissertation, Hengeveld (1992: 101),[79] Overall *et al.* (2018: 8), and Haspelmath (2025: 4) recognize distinct locative and existential predicates; although all three agree on the term EXISTENTIAL, they use slightly different names to refer to locative predicates (LOCATION / LOCATIVE and PREDLOCATIVE, respectively). Creissels *et al.* group some locative predicates into their inclusion category and others into a combined LOCATIONAL / EXISTENTIAL category; they do not have a separate category just for existential clauses (2026: 14, 18–25). Stassen alone groups locative, existential, and possessive clauses together under the single category of LOCATION (1997: 15).

The concept of possession is generally taken to be a universal of human cognition (Heine 2001; Stassen 2009). Possessive predicates are those that express some degree of control exercised by a POSSESSOR over a POSSESSEE (Heine 1997a; Herslund & Baron 2001; Dixon 2010a; Danesi & Barðdal 2018; Croft 2022). A possessive clause must include a Possessor argument, a Possessee argument, and some way of defining the relationship between them. There

[79] Although he recognizes locatives and existentials as separate predicate types, Hengeveld does group them together under the overarching category of LOCALIZING predicates (1992: 94).

are numerous syntactic strategies for encoding the relationship between the possessor and possessee (including both verbal and nonverbal strategies, among others), and even more potential semantic relationships (Clark 1978; Heine 1997a; Heine 1997b; Stassen 1997; Stassen 2009; Dixon 2010a; Overall, Vallejos & Gildea 2018; Croft 2022). In this dissertation, I am concerned with nonverbal (as opposed to verbal) possessive clause constructions. As Table 5.3 shows, Creissels *et al.* (2026: 26–31), Hengeveld (1992: 100–101), and Overall *et al.* (2018: 10) all include a single POSSESSIVE / POSSESSION predicate in their typologies of nonverbal predicates. In contrast, Haspelmath makes a high-level distinction between clauses such as *I have money* vs. *The money belongs to me*, referring to them as PREDPOSSESSIVE and APPERTENTIVE, respectively (2025: 4–5);[80] however, he also distinguishes several additional subtypes of each based on different coding strategies. Although Stassen (1997) subsumes possessive predicates under his LOCATION category in the typology represented in Table 5.3), locational possession is just one of four types of predicative possession he describes in his (2009) book.

5.2.2 Basic Constructions

In §5.2.1, I give a brief overview of different types of nonverbal predicates based on several typological descriptions. Henceforth, I use the functional types proposed by Overall *et al.* (2018) as the basis for my descriptions of nonverbal predicate constructions in Afghan Wakhi. In §5.2.2.1 – §5.2.2.6, I discuss basic nonverbal clause constructions, which are unmarked in terms of both grammar and frequency. These constructions do not require a copula in the nonpast, but they do require a copula to indicate other tenses or negative polarity.

[80] Not all linguists agree with Haspelmath that possessive clauses formed with *have* or *belong* are examples of nonverbal predicates (cf. Heine 1997b: 86–88; Stassen 2009).

My description of nonverbal predicates in Afghan Wakhi is organized structurally, beginning with nominal predicates in §5.2.2.1. Adjectival predicates are the topic of §5.2.2.2, followed by adverbial and other locative predicates in §5.2.2.3. Section 5.2.2.4 and §5.2.2.5 are devoted to existential clauses and possessive clauses, respectively.

5.2.2.1 Basic NP Predicates

Afghan Wakhi has one basic nonverbal predicate construction in which an NP serves as the semantic predicate of the clause. In the nonpast, this construction juxtaposes a non-case-marked NP_{SUBJ} with an NP_{PRED}, in that order, as seen in (357) – (360); it may optionally include a subject indexing clitic (359) – (360). This construction is used for both identification and classification. In each pair of examples given in (357) – (360), the first (odd-numbered) example is functionally an identification predicate, and the second (even-numbered) example is a classification predicate.

(357) NP_{SUBJ} NP_{PRED}
[*jəm*] [*əm jinʊk*].
PROX 3SG.PROX dream
'This is his dream.' (25.013)

(358) NP_{SUBJ} NP_{PRED}
[*jɐw*] [*ji pɔtʃɔ ðəwɟd*].
3SG.DIST one king daughter
'She is a king's daughter.' (TEX-0014-1.51)

(359) NP_{SUBJ} $NP_{PRED=SUBJ}$
[*tu*] *ɐ=*[*ðɐj kʊnd*]*=ʊt.*
2SG.NOM EMPH=man wife=2SG
'You are the man's wife.' (04.26)

(360) NP_{SUBJ} $NP_{PRED=SUBJ}$
e pɐ, [*tu*] *xɐj* [*muisfid*]*=ʊt, e kɐ*!
VOC INTJ 2SG.NOM INTJ old.man=2SG VOC boy
'Oh wow, well you're an old man, dude!' (06.075)

The subject NP may be omitted from an identity or categorization clause as long as it is clear or recoverable from context. Although a subject-indexing enclitic may index the omitted subject, one is not required. When the NP_{SUBJ} is omitted, the NP_{PRED} may stand alone, as in (361), or it may be accompanied by a copula, as in (362).

(361) NP_{PRED}=SUBJ
ɐlbɐt [*məktɐb-i*] *=ʊt?*
certainly school-NMLZ=2SG
'Surely you are a student?' (06.005)

(362) NP_{PRED} COP
[*məktɐb-i*] *=əm* *tʊj,* *ɔ.*
school-NMLZ=1SG COP yes
'I am a student, yes.' (06.006)

To indicate negative polarity, or a tense or modality other than the nonpast indicative, a copula is required in clause-final position.[81] An example of a negative polarity identity predicate is given in (363), and a past tense categorization predicate in (364).

(363) NP_{SUBJ} NP_{PRED} COP
[*jʊt*] *=əʂ* [*rəʝiiʂ*] *nɐst.*
MED=IPFV beard COP.NEG
'That's not a beard.' (02.20)

(364) NP_{SUBJ} NP_{PRED} COP
bɔz [*t͡ʃigɐsʊk=i* *tilɔ-i*] [*ji* *sɐmɔn=i* *ɣɐ* *qimɐt-i*] *tu,* *sɐji=ɐ?*
then shelf=EZ gold-ADJ one furniture=EZ INTS expense-ADJ COP.PST okay=Q
'Then the golden shelf was a very expensive furnishing, okay?' (25.012)

5.2.2.2 Basic AP Predicates

Nonverbal predicate constructions that have an adjective phrase (AP; cf. §3.4.1) as their predicate express property concepts, which encompasses both permanent and temporary properties. In basic property concept constructions, the NP_{SUBJ} and AP_{PRED} are juxtaposed, as

[81] Although my current corpus does not contain an example of an NP predicate in a non-indicative mood, the structure would be analogous to that seen for other non-indicative nonverbal predicate constructions, such as a subjunctive AP predicate (369).

shown in (365) – (367). The subject is in the Default form. A clitic may be used to index the subject, as in (367), but subject marking is not an obligatory part of this construction.

(365) NP_{SUBJ} AP_{PRED}
[*ɖɔkdɐr=ən jɐw qisɐ*] [*rɔsṭ*].
doctor=POSS 3SG.DIST story right
'The doctor's words are right.' (24.13)

(366) NP_{SUBJ} AP_{PRED}
ɣɐl [*ʐi̯ nɐn*] [*bʊ-qwɐt*].
still 1SG.GEN mother COM-strength
'My mother is still strong.' (02.11)

(367) NP_{SUBJ} AP_{PRED}=SUBJ
[*ruzgɔr*] [*kɐm=i xub-tər*] *=it*[82].
living a.little=EZ good-CMPR=3SG
'Daily life is a little better.' (TEX-0023.100)

If the subject of a property concept construction is clear or recoverable from the discourse context, it may be omitted, leaving only the predicate and a subject-indexing enclitic, which is required when the subject is absent. Examples (368) and (369) illustrate temporary and permanent property predicates (respectively) from which the subject has been omitted.

(368) AP_{PRED}=SUBJ
[*bɐf*] *=əm.*
good=1SG
'I'm good.'[83]

(369) AP_{PRED}=SUBJ COP
ɐ=d=ʊt ukumɐt=i nɐd͡ʒib [*bɔswɔd*] *=əm tu.*
EMPH=LOC=MED government=EZ Najib literate=1SG COP.PST
'In that government of Najib's, I was literate.' (TEX-0023.052)

[82] The form *=it* is rare, but it does occur a few times in my corpus as a variant of the 3SG subject marking clitic *=i*. Shaw (1876: 14–16) includes the morpheme *it* as a 2SG pronoun in what he calls "separable terminations" (i.e., clitics); he includes a homophonous suffix *-it* '2PL' in his paradigm of subject marking suffixes used with nonpast verbs. Like Shaw, Bashir describes *-it* as a 2PL suffix; however, she also identifies a morpheme *=it* as a 3SG copula (2009: 835).

[83] This utterance is a common response to greetings given when the speaker is generally in a positive state. The Afghan Wakhi are also known to give a genuine negative response, such as *tumr bɐf nɐst=əm* 'I'm not so good', when circumstances warrant it.

Example (369) also demonstrates that a clause-final copula is required to indicate tenses other than the nonpast. A copula is similarly required to indicate negative polarity (370) or non-indicative mood (371).

(370) NP$_{SUBJ}$ AP$_{PRED}$ COP
mɐr [*ʊt͡ʃ kʊnd*] [*zɐrurɐt*] *nɐst.*
1SG.DAT none wife necessary COP.NEG
'No wife is necessary for me at all.' (02.59)

(371) NP$_{SUBJ}$ AP$_{PRED}$ COP
[*jɐw ʂɐfʂ*] [*jəm rɐqɐm ʂɨw*] *ʊmʊt.*
3SG.DIST hair PROX type black COP.SBJV.3SG
'Her hair should be black like this.' (TEX-0014-1.44)

5.2.2.3 Basic Adverbial Predicates

In some nonverbal predicate constructions, a locative adverbial constituent functions as the predicate (cf. Creissels, Bertinetto & Ciucci 2026). Such constructions function as locative clauses in Afghan Wakhi. The adverbial predicate may be an adverb (372) or an adverbial PP (373); regardless, the predicate follows the NP$_{SUBJ}$, which is in either the Nominative or Default form (cf. §3.1.3.1 and §3.1.3.2). When the semantic predicate is an adverbial PP, a subject that is recoverable from the discourse context may be omitted, as in (374).

(372) NP$_{SUBJ}$ ADV$_{PRED}$
[*jəm*] [*ɣɐl drəm*].
3SG.PROX still LOC.PROX
'He is still here.' (25.178)

(373) NP$_{SUBJ}$ PP$_{PRED}$
ɐ=[*ʒɐrʒ*] *bʊt* [*tɐ xun*]*!*
EMPH=milk also up.to house
'That milk is up at the house!' (03.14)

(374) PP$_{PRED}$ COP
[*də zɐç ruj*] *t͡sʊ̯j.*
LOC thorn face COP.FACT
'(They) are on the face of the thornbushes.' (06.055)

An NP may also function as a locative predicate. For example, example (375) has the apparent form of a categorization clause since there is no preposition preceding *məktɐb* 'school'. However, logically it is obvious that the speaker is not claiming to be a school, so listeners know to interpret *məktɐb* as a locative predicate. This locative use of NPs is not limited to nonverbal predicates; an NP may also function as a locative in verbal clauses (376).

(375) NP_{SUBJ}=SUBJ NP_{PRED} COP
[*wuz*]=*əm* [*məktɐb*] *tu.*
1SG.NOM=1SG school COP.PST
'I was at school.' (01.05)

(376) NP_{SUBJ} NP_{LOC}
t͡s=*əm* *ɐmsɔjɐ*=*n,* [*truj* *t͡sbɨr* *xɐlg*] *rəwʝ-di* [*jɐw* *tɐt* *xun*].
from=3SG.PROX neighbor=ABL three four person go-PST 3SG.DIST father house
'From the neighbors, three or four people went to her father's house.' (TEX-0003.17)

A copula is required as the final constituent when a locative clause is in a tense other the nonpast; it is also required to indicate negative polarity. Example (375) displays a copula in a past tense locative clause construction. Negative-polarity locative clauses in the past and nonpast can be seen in (377) and (378), respectively.

(377) PP_{PRED}=SUBJ COP
[*tɐ* *xun*]=*ʊt* *bʊ* *nʊ*=*tu!*
up.to house=2SG also NEG=COP.PST
'You weren't up at the house!' (03.16)

(378) NP_{SUBJ} ADV_{PRED} COP
[*mɔl*=*əʃ*] [*tr*=*ɐ*] *nɐst.*
flock=PL.DFLT over.to=DIST COP.NEG
'The flocks aren't over there.' (03.03)

5.2.2.4 Existential Clauses

Existential clauses in Afghan Wakhi could be analyzed either as lacking a predicate or as the missing marked-locative construction (cf. §5.2.3.3). As noted in §5.2.1, the constituents of an existential construction are commonly referred to as a figure (FIG) and ground (GRND).

In Afghan Wakhi, an existential clause may or may not include a locative ground constituent (cf. SanGregory 2025a: 278). When the ground is included, it appears in clause-initial position followed by the figure constituent. The copula may or may not appear in an existential clause that has a ground constituent, as seen in (379) and (380), respectively; however, when it does occur, it is final in the clause.

(379) GRND FIG
[*tr=əm*] [*ɣɐ ˌjuz*].
over.to=PROX INTS firewood
'Over here there's a lot of firewood.' (05.03)

(380) GRND FIG COP
[*ji pɐlɬw*] [*bɔj dəʝɐr*] *bʊ tʊj.*
one side cave another also COP
'On one side is another cave.' (25.500)

Many existential clauses do not include a ground. When there is no ground constituent in the clause, the copula is required, regardless of tense, mood, or polarity (cf. SanGregory 2025a: 279), as shown in (381) – (384). Sentence (381) provides an example of an existential clause in the nonpast tense, while (382) displays one in the past tense. An existential clause in the subjunctive mood is given in (383), and (384) shows a negative existential.

(381) FIG COP
[*miwɐ*] *bʊ tʊj.*
fruit also COP
'There is also fruit.' (06.058.02)

(382) FIG COP
[*ji pɔtʃɔ*] *tu.*
one king COP.PST
'There was a king.' (25.001)

(383) FIG COP
[*ji dərɐxt*] *bɔjɐd ʊmʊt.*
one tree must COP.SBJV.3SG
'There must be a tree.' (12.07)

(384) FIG COP
[*jɐrk*] *nʊ=tu.*
work NEG=COP.PST
'There was no work.' (09.01)

5.2.2.5 Basic Possessive Clauses

Afghan Wakhi does not have a distinct verb of possession. Instead, it uses a nonverbal predicate construction to encode predicative possession. Possessive clauses contain two obligatory arguments: a Possessor noun phrase (POSR) marked with the Possessive case marker *=ən* 'POSS', and a Possessed noun phrase (POSD) that is morphologically unmarked. In the nonpast, the most common construction juxtaposes POSR and POSD arguments without a copula, as seen in (385). However, as is the case for other nonverbal clause constructions, a copula is required to indicate negative polarity (386) or tenses other than the nonpast (387).

(385) POSR POSD
ɐ=[*jəm pɐri=ən*] [*ji çɨj də diw=i sɐfid kɐf*].
EMPH=PROX fairy=POSS one sister LOC ogre=EZ white palm
'This fairy has a sister in the hand of the white ogre.' (25.157)

(386) POSR POSD COP
[*jɐw=ən*] [*bɐrq*] *nɐst.*
3SG.DIST=POSS electricity COP.NEG
'It [the village] doesn't have electricity.' (TEX-0306-2.16)

(387) POSR POSD COP
jɐn [*zɻ=nən*] [*ji tufɐngt͡ʃɐ*] *tu.*
then 1SG=POSS one gun COP.PST
'And I had a gun.' (11.02)

It may be tempting to analyze the POSR and POSD as members of a single constituent. In such an analysis, (387) would literally translate as, 'Then my gun was.' However, I analyze the POSR and POSD as separate constituents for several reasons. First, as I describe in §3.1.3.5, adnominal possessors prototypically occur in the Genitive case (first- and second-person pronouns) or in the Default form (nominal NPs and 3rd person pronouns). Second, although the

Possessive case may be used for adnominal possession, it holds this function only in two specific constructions (cf. §3.4.2), neither of which is found in possessive clauses. Third, as I show in §5.2.3.5, the order of the POSR and POSD arguments may be reversed, and either may follow the copula. Given that other constituents besides a POSR can be postposed but cannot be interrupted by a copula in Afghan Wakhi (such as the PP in (388); cf. §5.2.3.6), I analyze the POSR and POSD as separate constituents.

(388) *tu=ṣ* *t͡sɔ͡ydr* *rʊt͡ʂ* *tər* *çɨ* *tɐt* *xun?*
2SG.NOM when go.2SG over.to self.GEN father house
'When are you going to your father's house?'

The Possessive and Ablative case markers are syncretic (=*ən*, cf. §3.1.3.7). Formally, these two cases can be distinguished only on SAP pronouns: the Possessive case marker attaches to a Genitive stem (e.g., *ti=(n)ən* '2SG=POSS'), and the Ablative marker attaches to a Default stem (e.g., *tɐw=ən* '2SG=ABL'). Nevertheless, the formal syncretism of the Possessive and Ablative markers themselves suggests a historical connection not just between them, but also between possessive and locative clauses (cf. SanGregory 2025a: 293). Given the structural similarity and potential historical relationship between possessive and locative clauses, I analyze the Afghan Wakhi possessive clause construction as an example of Stassen's (2009: 50) locative possessive, or what Heine (1997a: 64) refers to as the "Source Schema."

5.2.2.6 Summary: Basic Nonverbal Predicate Constructions

In §5.2.2.1 – §5.2.2.5, I have described the basic (i.e., most frequent) constructions used by speakers of Afghan Wakhi to express nonverbal predicates. These nonverbal predicate constructions fall into five broad categories based on the type of predicate or arguments they include: (1) clauses with an NP predicate (identification and classification clauses), (2) clauses with an AP predicate (property concept clauses), (3) clauses with an adverbial, PP, or locative

NP predicate (locative clauses), (4) existential clauses, and (5) clauses with possessor and possessed NP arguments (possessive clauses). With the exception of existential clauses, the default, nonpast construction for each of these categories does not include a copula.

The basic construction for nonverbal clause constructions with nominal, adjectival, and locative predicates is essentially the same: each includes an optional subject, a required predicate of the appropriate phrasal category, and an optional copula. Therefore, I analyze Afghan Wakhi as having a single macro-construction of the form [(NP_{SUBJ}) XP_{PRED} (COP)] that serves as the basic construction for these types of nonverbal predicates. Existential clauses must include either a clause-initial locative phrase (ground) or a clause-final copula in the nonpast; both are felicitous in the same construction, but if both are omitted, the clause is unacceptable to native speakers.

As described in §5.2.2.3 and §5.2.2.4, locative and existential clauses appear to be structurally distinct. However, the primary difference between them is only the position and optionality of the locative phrase: in locative clauses, it follows the subject and is obligatory, but in existential clauses, it is clause-initial and optional. The difference in constituent order is determined by pragmatic function, namely, whether the purpose of the clause is to predicate the location of a given entity (locative clause) or to introduce a new participant into the discourse (existential clause). Therefore, I conclude that there is no dedicated existential construction in Afghan Wakhi in terms of the typology presented in Creissels (2019). Instead, I analyze locative and existential clauses as different pragmatic functions of a single locative-existential construction (SanGregory 2025a: 292). I present them separately in Table 5.4 simply to highlight how information structure affects constituent order in the Afghan Wakhi locative-existential construction.

All nonverbal clause constructions require a copula to indicate negative polarity, tense, or mood other than the nonpast indicative. Table 5.4 displays a summary of the basic nonverbal clause constructions and their associated functions in Afghan Wakhi.

Table 5.4. Basic nonverbal predicate constructions

Predicate	**Construction**	**Functions**
NP	(NP_{SUBJ}) XP_{PRED} (COP)	Identification
		Categorization
ADV		Location
PP		
AP		Property Concepts
	(GRND) FIG COP	Existential
	POSR POSD (COP)	Possession

5.2.3 Marked Constructions

The basic constructions described in §5.2.2 are not the only syntactic strategies available to Afghan Wakhi speakers for expressing nonverbal predicates. Each of the functional types already described can be encoded by one or more alternate strategies. These additional strategies are marked in terms of both grammar and frequency (i.e., they are highly infrequent compared to the basic constructions). Presumably, they are also marked in terms of prosody and / or pragmatics. In-depth study of both verbal and nonverbal clause constructions is required to determine how syntax, prosody, and pragmatic function are correlated in Afghan Wakhi; such research is outside the scope of the present dissertation.

I describe marked nonverbal predicate constructions according to the syntactic category of their respective predicates: nominal predicates (§5.2.3.1), adjectival predicates (§5.2.3.2), adverbial predicates (§5.2.3.3), existential clauses (§5.2.3.4), and possessive clauses (§5.2.3.5).

Whenever possible, I suggest potential functions for the marked constructions I describe; however, my suggestions are no more than hypotheses at this point given the scarcity of the data and my limited access to native speakers. I summarize the different marked nonverbal clause constructions in §5.2.3.6 and conclude the chapter in §5.3.

5.2.3.1 Marked NP Predicate Constructions

In addition to the basic construction for clauses with an NP_{PRED} (cf. §5.2.2.1), Afghan Wakhi also has two marked constructions available for encoding identity and categorization functions. In the first of these constructions, the subject NP is postposed after the predicate. Examples of this structure can be seen in (389) and (391). In (389), the speaker makes a pause (indicated by a comma) before the postposed constituent. Example (391) forms a tail-head linkage with the preceding utterance from the same text (390).

(389) NP_{PRED} NP_{SUBJ}
[*mʊdir*], [*jɐw*]!
principal 3SG.DIST
'The principal he is!' (05.52)

(390) NP_{SUBJ} NP_{PRED}
[*ʐi nung*] [*jɐqin ʃɔ*].
1SG.GEN name Yaqin Shah
'My name is Yaqin Shah.' (TEX-008.01)

(391) NP_{PRED} NP_{SUBJ}
[*jɐqin ʃɔ*] [*ʐi nung*].
Yaqin Shah 1SG.GEN name
'Yaqin Shah is my name.' (TEX-0088.02)

In the second marked construction, the NP_{PRED} is postposed after the copula, which is a required constituent in this construction. The examples of this construction in my corpus are all used to name or introduce a new referent into the discourse, as examples (392) – (394) illustrate.

Therefore, it is possible that postposing the predicate may function as a presentational construction for nonverbal clauses in which the predicate is a noun phrase.

(392) NP_{SUBJ} COP NP_{PRED}
[*jəm*] *tʊj* [*ʂʁɕ*].
PROX COP c.vetch
'This is chickling vetch.' (TEX-0175.09)

(393) NP_{SUBJ} COP NP_{PRED}
[*jəm nung*] *tʊj* [*ðim*].
3SG.PROX name COP clay
'Its name is "thim" [i.e., clay].' (TEX-0059.14)

(394) NP_{SUBJ} COP NP_{PRED}
[*wuz*] *tʊj* [*wʊstɔd=i dəldung*].
1SG.NOM COP master=EZ tandoor
'I am a master of tandoors.' (i.e., a master craftsman who builds tandoor ovens) (TEX-0059.02)

5.2.3.2 Marked AP Predicate Constructions

I have found only one marked construction for nonverbal clauses with an adjectival predicate in my current corpus. In this construction, the order of the two primary constituents is reversed; that is, the NP_{SUBJ} follows the AP_{PRED} rather than preceding it, as it does in the basic construction (cf. §5.2.2.2). Two examples of this marked construction can be seen in (395) and (397). Example (395) may be an instance of right-dislocation given the pause (indicated by a comma) before the final constituent, as well as the falling intonation on the final constituent. Sentence (397) could also be an example of right-dislocation, or it may be an example of contrast with the immediately preceding clause, which is given as (396).

(395) *mɐqsɐd, jɐw bʊ ti sɐr rɐng ʈɐz*
purpose 3SG.DIST also 2SG.GEN head color bald



AP_{PRED} NP_{SUBJ}
ʊt jəm d͡zi [*bi-zib*], [*jɐw*].
and PROX way PRIV-beauty 3SG.DIST
'The point is, it [cantaloupe] is also bald like your head, and ugly like this, it (is).' (06.024)

(396) *ɐr ʃʊt bʊ jəm=ər nʊ=wɔst.*
all dirt also 3SG.PROX=DAT NEG=become.3SG
'Also all soil does not work for it.' (TEX-0059.15.1)



(397) AP_{PRED} NP_{SUBJ}
[*xɔs*] [*jəm*], *çɨ ʃʊt.*
particular 3SG.PROX self.GEN dirt
'Particular it is, my soil.' (TEX-0059.15.2)

5.2.3.3 Marked Adverbial Predicate Constructions

In the basic construction for locative clauses, the adverbial predicate immediately follows the subject (cf. §5.2.2.3). The location of the predicate varies in both of the two marked constructions for locative clauses. In the first of these, the adverbial predicate follows the copula, and in the second, it precedes the NP_{SUBJ}, as seen in (398) and (399), respectively. These examples differ from the marked nominal predicates in (395) and (397) in two ways: (1) there is no pause before the final constituent, and (2) they include a copula.

(398) NP_{SUBJ} COP PP_{PRED}
[*wuz*] *ʊj=əm* [*də tɐw=ən*].
1SG.NOM COP=1SG COM 2SG=ABL
'I am with you.' (25.121)[84]

[84] NB: Pragmatically, this sentence was uttered as a threat.

(399) PP_{PRED} NP_{SUBJ} COP
[*tər kum nɐg*] [*ʊt ˌjuz*] *tu?*
over.to which place MED firewood COP.PST
'Where was that firewood?' (05.01)

The default position for questioned and / or focused constituents in Afghan Wakhi is immediately before the verb (SanGregory 2025a: 289). Therefore, the questioned adverbial predicate's position at the beginning of the clause (399) is of particular interest because not only does it differ from the basic structure for locative clauses, but also it departs from the expected constituent order for questions. I hypothesize that the structure of (399) has less to do with the adverbial predicate and more to do with the subject. Specifically, I suspect that the speaker uses this construction to focus the subject, with an effect similar to saying, "Where was **that** firewood?" in English. Further examination of other questions in Afghan Wakhi is needed to test this hypothesis.

5.2.3.4 Marked Existential Constructions

Marked existential clauses exhibit a range of variations from the basic constituent structure described in §5.2.2.4. First, either of the primary constituents (figure or ground) may be postposed. In (400), the figure has a rising pitch and appears after the copula without any pause. However, in both (401) and (402), the ground follows the copula and a pause (indicated by a comma), and it has a low pitch. I hypothesize that these are examples of two different postposing constructions with unique pragmatic functions, as I discuss in §5.2.3.6.

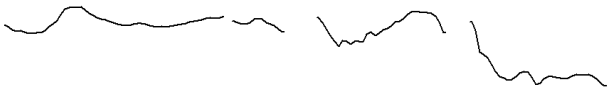


(400) GRND COP FIG
[*də ji t͡ʃɔjnʊk*] *tu* [*ʒɐrʒ*].
LOC one teapot COP.PST milk
'In a teapot there was milk.' (17.01)

(401) FIG COP
ɐ=[jɐ ɐks] bʊ tu,
EMPH=3SG.DIST picture also COP.PST



FIG COP GRND
[tɐswir] bʊ tu, [də kitɔb].
illustration also COP.PST LOC book
'Its picture was there, (and) there was an illustration, in the book.' (01.30)



(402) FIG COP GRND
[jiɰun miwɐ] mɐsɐlɐn nɐst, ɐ=[dr=əm]?
some fruit for.example COP.NEG EMPH=LOC=PROX
'For example, aren't there some fruits, [even] here?' (06.050)

In very rare cases, an existential clause may comprise just a figure, with neither a ground nor a copula. This structure only occurs in subordinate clauses, as seen in (403) and (404); therefore, I conclude that this is a specific existential clause construction limited to subordinate clauses.

(403) ji d͡ʒɐj rʊt͡ʂ-ən
one place go-3PL

FIG
ki [bu vəduk].
COMP two road
'They go to a place where there are two roads.' (25.059)

(404) FIG
fɐkɔi, gɐrt͡ʃi [bu qism fɐkɔi] . . .
h.story although two kind h.story
'As for humorous stories, although there are two kinds of humorous stories . . .' (TEX-0025.01)

The final marked construction used for existential clauses is identical to the default structure of locative clauses: an NP figure (i.e., NP_{SUBJ}) followed by an adverbial ground (i.e.,

ADV$_{PRED}$ or PP$_{PRED}$), with an optional clause-final copula. Although such clauses structurally look like locative clauses, they do not function as locatives. That is, they do not predicate the location of a specific entity, but rather serve to introduce (405) or assert the (non)existence of a referent (406). Such examples illustrate the lack of formal distinction between locative and existential clauses in Afghan Wakhi, which I analyze as being merely different pragmatic uses of the single locative-existential construction (SanGregory 2025a: 292).

(405) FIG GRND
xɐj, [*ji skid*]=*i* [*də çɨ sɐr*], *nʊj*=*ɐ?*
INTJ [one hat]=3SG [LOC self.GEN head] no=Q
'Well, there is an embroidered hat on your head, no?' (06.080)

(406) FIG GRND COP
[*bʊt ruɟn*] [*d*=*əm xun*] *nɐst.*
also oil LOC=PROX house COP.NEG
'There isn't any other oil in the house.' (04.03)

5.2.3.5 Marked Possessive Constructions

Afghan Wakhi has three marked possessive clause constructions that differ from the basic construction described in §5.2.2.5. In the first of these, the order of the POSR and POSD argument is reversed; i.e., the possessee is initial in the clause, as seen in (407) and (408). In SanGregory (2025a: 281), I analyze this construction as non-basic on the basis of frequency. However, the POSD-initial construction accounts for nearly half of the possessive clauses examined for this dissertation. Therefore, at least in terms of frequency, this construction does not seem to be as marked as previously suggested.

(407) POSD POSR
[*tqi mʊʃkilɔt*=*əʃ*] [*jəm*=*ən*].
many difficulty=PL.DFLT 3SG.PROX=POSS
'It [millet] has many difficulties.' (TEX-0088.2.2)

(408) POSD POSR COP
[*zur*] [*ti=nən*] *nɐst.*
strength 2SG=POSS COP.NEG
'You have no strength.' (05.57)

In the second non-basic possessive clause construction, the possessee argument is postposed after the copula. Examples of this construction are given in (409) and (410). This construction strongly resembles the marked NP_{PRED} constructions in (392) – (394) and the marked existential constructions in (400) – (402). I explore this resemblance in §5.2.3.6.

(409) POSR COP POSD
[*əm pɔtʃɔ=ən*] *tu* [*bu kʊnd ʊt tru pʊtr*].
PROX king=ABL COP.PST two wife and three son
'This king had two wives and three sons.' (25.003)

(410) POSR COP POSD
[*jəm pɔtʃɔ=ən*] *sk=əm xɔr kʊnd=ən bʊ tu* [*ji pʊtr*] *ʊt*
PROX king=POSS on=3SG.PROX disfavored wife=ABL also COP.PST one son and

COP POSD
sk=əm nɔziun kʊnd=ən bʊ tu [*bu pʊtr*].
on=3SG.PROX favored wife=ABL also COP.PST two son
'This king had one son by his unbeloved wife, and (he had) two sons by his beloved wife.' (25.005)

The third and final marked construction for possessive clauses has an initial copula, followed by the possessor and possessee arguments, respectively. I currently have only one example of this construction in my corpus (411).

(411) COP POSR POSD
nɐst, [*ti=nən*] [*zur*].
COP.NEG 2SG=POSS strength
'You don't have any strength!' (lit., 'It is not, of yours strength!') (05.56)

5.2.3.6 Summary: Marked Nonverbal Predicate Constructions

Afghan Wakhi has a number of marked nonverbal predicate constructions, as described in §5.2.3.1 – §5.2.3.5. All of these constructions are marked in terms of syntax. With the

exception of the possessee-initial possessive clause construction, they are also all marked in terms of frequency. A summary of these constructions is displayed in Table 5.5. The first column of this table groups the marked constructions into types based on their similarities. Constructions that belong to the same broad type share a number, while sub-types are indicated by a letter in parentheses; thus, 1(a) indicates a sub-group within marked type 1. The second column displays each individual construction, and the third column gives the number of examples in my corpus that use each construction. The function associated with each type is listed in the final column. In the following discussion, I address each type and its sub-groups in the order in which they are presented in Table 5.5.

Table 5.5. Marked nonverbal clause constructions

Type	Construction	Number	Function
1(a)	NP_{PRED} NP_{SUBJ}	2/46	Presentational
	NP_{SUBJ} COP NP_{PRED}	6/46	
1(b)	GRND COP FIG	1/33	
1(c)	POSR COP POSD	3/23	
2(a)	AP_{PRED} NP_{SUBJ}	3/54	Anti-topic
2(b)	NP_{SUBJ} COP PP_{PRED}	1/27	
2(c)	FIG COP GRND	4/33	
2(d)	COP POSR POSD	1/23	
3	PP_{PRED} NP_{SUBJ} COP	1/27	Residue
	FIG	2/33	
	FIG GRND (COP)	2/33	
	POSD POSR (COP)	10/23	

I find that marked constructions with postposed constituents form two similar groups. Type 1 comprises (a) NP_{PRED} constructions in which the subject is postposed, (b) existential clauses in which the figure is postposed, and (c) possessive clauses in which only the possessee is postposed; examples of each type are repeated below as (412) – (414), respectively. In context, each of these clauses serves to introduce a new referent (the postposed NP_{SUBJ} or FIG) into the discourse. A clause with this type of introductory function is commonly referred to as being PRESENTATIONAL (as opposed to PREDICATIONAL) (Lambrecht 1994; Stassen 1997; Croft 2022). It is reasonable that both nominal and possessive predicates be used in a dedicated presentational

construction. However, it is unclear why existential clauses, which are inherently presentational, would also take a marked presentational construction.

(412) NP_{PRED} COP NP_{SUBJ}
[*jəm*] *tʊj* [*ʂɐɕ*].
PROX COP c.vetch
'This is chickling vetch.' (TEX-0175.09)

(413) GRND COP FIG
[*də ji t͡ʃɔjnʊk*] *tu* [*ʒɐrʒ*].
LOC one teapot COP.PST milk
'In a teapot there was milk.' (17.01)

(414) POSR COP POSD
[*əm pɔtʃɔ=ən*] *tu* [*bu kʊnd ʊt tru pʊtr*].
PROX king=ABL COP.PST two wife and three son
'This king had two wives and three sons.' (25.003)

Type 2 represents the second group of constructions with postposed constituents. This group includes (a) property concept clauses in which the subject is postposed, (b) locative clauses in which the predicate is postposed, (c) existential clauses in which the ground is postposed, and (d) possessive clauses in which both arguments (possessor and possessee) are postposed after the copula. Examples of these constructions are repeated below as (415) – (421), with accompanying examples for context as needed. In (415), the grammatical subject (a cantaloupe) is already topical enough in the first clause (first line of the example) to be expressed via an anaphoric pronoun; in the second clause, the subject NP is postposed, and it carries a falling pitch.

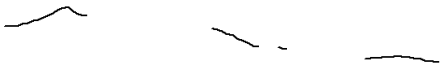
(415) *mɐqsɐd, jɐw bʊ ti sɐr rɐng ʈɐz*
purpose 3SG.DIST also 2SG.GEN head color bald



AP$_{PRED}$ NP$_{SUBJ}$
ʊt jəm d͡zi [*bi-zib*], [*jɐw*].
and PROX way PRIV-beauty 3SG.DIST
'The point is, it [cantaloupe] is also bald like your head, and ugly like this, it (is).' (06.024)

Example (416) is the context that immediately precedes (417) in the folktale from which these two examples come. In (416), the subject (an ogre, mentioned in preceding clauses) is addressed in quoted speech via the pronoun *tɐw* '2SG'. In the following utterance (417), the ground phrase *də tɐw=ən* 'with you', which refers to the same ogre, follows the copula and bears a low pitch.

(416) *wɔlɔ tɐw əm jɐʃ=i ɣɐ zɐr kər-ti.*
INTJ 2SG PROX horse=ACC INTS injured do-PST
'"Gosh you have really injured this horse."' (25.120)



(417) NP$_{SUBJ}$ COP PP$_{PRED}$
ʊt digɐ, xʊj, [*wuz*] *tʊj=əm* [*də tɐw=ən*].
and also DISC 1SG.NOM COP=1SG COM 2SG=ABL
'And also, "Well, I am with you."' (25.121)

The remaining pairs of examples show a similar pattern: in both (419) and (421), referents mentioned in the immediately preceding context (given as (418) and (420), respectively) are postposed and uttered with a falling pitch that is lower than the pitch on the immediately preceding words in the clause.

(418) *jɐ* *kʊp=əʃ* *də* *kitɔb* *nəwiʃtɐ* *tu=ɐ?*
3SG.DIST hump=PL.DFLT LOC book writing COP.PST=Q
'Were its [a camel's] humps written in the book?' (01.30)



(419) FIG COP FIG COP GRND
ɐ=[*jɐ* *ɐks*] *bʊ* *tu,* [*tɐswir*] *bʊ* *tu,* [*də* *kitɔb*].
EMPH=3SG.DIST picture also COP.PST illustration also COP.PST LOC book
'(There) was a picture, (and there) was an illustration, in the book.' (01.30)

(420) *wuz* *bʊ* *zur* *zi=n* *tʊj*
1SG.NOM also strength 1SG=POSS COP

ki *tɐw=i* *di-məm.*
COMP 2SG=ACC hit-1SG
'I also have (enough) strength to hit you.' (05.55)



(421) COP POSR POSD
nɐst, [*ti=nən*] [*zur*].
COP.NEG 2SG=POSS strength
'You don't have strength!' (lit., 'It is not, your strength!') (05.56)

The constructions seen in (415), (417), (419), and (421) appear to be examples of what Lambrecht calls an ANTI-TOPIC (1994: 128, 203), i.e., a postposed referent that is highly accessible or salient. I tentatively hypothesize that in these constructions, postposing serves to deemphasize the postposed topical constituent.

Type 3 in Table 5.5 includes one marked locative construction, two marked existential constructions, and one marked possessive construction. At this time, I cannot offer any hypotheses about the functions associated with these constructions. Therefore, I label them as residue in need of further research.

Given the paucity of the data, it is currently impossible to do more than speculate about the pragmatic functions of these and other marked nonverbal clause constructions. Further examination of postposed constituents across all types of clauses (both verbal and nonverbal) is necessary to determine the exact pragmatic function(s) associated with each type of marked nonverbal clause construction in Afghan Wakhi.

5.3. Summary

In this chapter, I have described both basic and marked nonverbal predicate constructions in Afghan Wakhi. In affirmative, nonpast clauses, juxtaposition of the subject and nonverbal predicate is the most common construction, regardless of the type of predicate. The only exception to this pattern is existential clauses, which contain a copula approximately 50% of the time. Since existential clauses do not have subject and predicate constituents in the same sense that other clauses do, it is perhaps to be expected that they also have different syntax.

In negative polarity clauses or tenses other than the nonpast, all nonverbal clause constructions must contain a copula to convey these grammatical features. The primary copula used in stative nonverbal clause constructions is *tʊjɐ̀k* 'COP'. Many of this copula's tense and polarity forms are invariant particles, although it does have a complete subjunctive paradigm in the nonpast tense (unlike any other verb in Afghan Wakhi).

Locative clauses are the only type of nonverbal clause that has three basic constructions: one for clauses with an adverb as the predicate, one for clauses with a locative PP as the predicate, and one for clauses with a locative NP as the predicate. All other functional predicate types (identity and categorization, property concepts, existentials, and possessives) have only one basic clause construction. However, there is much more variety in the number and types of marked constructions used for nonverbal clauses. I hypothesize that certain postposing

constructions serve a presentational function, while others appear to deemphasize the importance of the postposed constituent. Further research, including collecting more examples, conducting felicity testing with native speakers, and studying prosodic melodies and their associated uses across the language, is needed to determine the full range of pragmatic functions associated with the various marked nonverbal clause constructions. Be that as it may, one thing is certain: Afghan Wakhi speakers make use of a variety of nonverbal clause constructions to express themselves creatively and meaningfully in different situations.

CHAPTER 6

LIGHT VERB CONSTRUCTIONS

Verbal and nonverbal predicates, as discussed in Chapter 4 and Chapter 5, are two fairly well-known strategies for expressing predicative concepts cross-linguistically. However, some languages make use of another type of predicative construction referred to as a LIGHT VERB CONSTRUCTION. Afghan Wakhi is one such language: not only does it use light verb constructions, but it does so pervasively and productively.

In this chapter, I investigate light verb constructions in Afghan Wakhi with the goal of beginning to shed light on how speakers use these constructions so productively. I begin in §6.1 with an introduction to light verb constructions as described in the literature, followed in §6.2 by an introduction to general features of the light verb constructions of Afghan Wakhi. Section 6.3 contains a brief introduction to *Aktionsart* (lexical aspect) types as used in this chapter. In §6.4, I examine five common light verbs in Afghan Wakhi and the patterns that emerge from the various light verb constructions in which they participate. I mention other less-common light verb constructions in §6.5 before discussing light verb alternations in §6.6. In §6.7, I briefly describe a mismatch between semantics and morphosyntax found in certain LVCs, and in §6.8, I touch on the topic of LVC innovation. Finally, I summarize the chapter in §6.9.

6.1. Introduction to LVCs

Many languages exhibit a type of construction in which both a nonverbal (or nonfinite verb) element and a verbal element work together to function as the predicate of a clause, as seen in examples such as *take an exam* or *make the bed*. Constructions of this type are mono-clausal: the component parts function as a single predicate in the same clause, not as predicates of a matrix and embedded clause (Mohanan 1997: 433; Butt & Geuder 2001: 324–326). Neither are

they examples of a typical use of a lexical verb with its associated arguments; rather, they convey a "true event description" (Butt & Geuder 2001: 354). For example, in the case of *make the bed*, there is no act of creation: the "making" refers to act of arranging the bedlinens on an already-existing bed. This example illustrates the necessity of both elements for the structure and semantics of the entire clause (cf. Shirtz 2017: 226). As Family further explains:

> These constructions have their own meaning and argument structure, not directly derived from the meaning and argument structure of their individual component parts. . . . [They are] a single semantic unit. Their semantics range from transparent to opaque. . . but they are all treated as the same type of phenomenon in regards to meaning construction and disambiguation. (2014: 5)

A review of the literature shows that several different terms have been used for this type of construction, including COMPLEX PREDICATE, COMPOUND VERB, COMPOSITE PREDICATE, and LIGHT VERB CONSTRUCTION (cf. Folli, Harley & Karimi 2005; Butt 2010: 2; Shirtz 2017: 223; Mohanan 1997: 432). The term "complex predicate" is one of the more common options used to refer to this type of predicative construction. However, Bowern observes that "complex predicate" is also frequently used as an umbrella term for a variety of diverse and unrelated predication strategies (2008: 162–165). Therefore, I use the more precise term LIGHT VERB CONSTRUCTION to refer to a specific type of complex predicate found in Afghan Wakhi.

The term "light verb construction" (LVC) is based on the observation that the verbs that participate in these constructions are semantically bleached or "light" to some degree (Jespersen 1965: 117; Bowern 2008: 163). Accordingly, such verbs are referred to as LIGHT VERBS (LVs). Despite the name, many linguists reject the assertion that LVs are semantically empty (Butt & Geuder 2001: 325–326). As Butt points out, "The verbs are clearly not entirely devoid of semantic predicative content . . . : there is a clear difference between *take a bath* and *give a bath*" (Butt 2010: 1).

Several common functions have been identified as contributions light verbs may make to the LVCs in which they participate. For example, in languages that rely heavily on LVCs, LVs act as "verbalizers" that facilitate the creation of new predicates, particularly from borrowed words (Butt 2010: 3–4; Bowern 2008: 172; Family 2014: 7). LVs often contribute to the argument structure of the overall predicate (Butt & Geuder 2001: 325; Folli, Harley & Karimi 2005: 9). They may contribute semantics such as inception, agentivity and / or responsibility (or the lack thereof), causation, benefaction and / or malefaction, forcefulness, and trajectory, among other things (cf. Butt & Geuder 2001: 335, 346; Butt & Ramchand 2005: 117; Folli, Harley & Karimi 2005: 11, 13; Bowern 2008: 163). The choice of LV can also affect the *Aktionsart* (i.e., lexical aspect; Vendler 1967) of the LVC, as evidenced by semantic contributions including suddenness, duration, completion, and the like (Butt 2010: 4; Folli, Harley & Karimi 2005: 15; Shirtz 2017: 229; Butt & Ramchand 2005: 117).

Lists of features such as those given above may make it seem that LVs are merely inflectional morphemes or auxiliaries used to convey tense and / or aspect distinctions; however, that is not the case. In fact, a verb that functions as a light verb is always "form identical" to a full lexical verb found elsewhere in the language (Butt 2010: 5; Bowern 2008: 167, fn. 8). Except in somewhat rare cases, such as the Persian verb *kærdæn* 'to do', which is rarely used with its original lexical meaning (Family 2014: 61), verbs that function as LVs also function productively as heavy verbs (i.e., regular lexical verbs) in the same language. Regardless of whether they function as a light or heavy verb in a given construction, these verbs inflect for all the same categories, such as tense, aspect, person, number, etc. (Butt & Ramchand 2005: 123). They can also occur in the same auxiliary constructions, which is characteristic of lexical rather than grammatical elements like auxiliaries (Butt 2010: 10, 13–14).

Depending on the language, different word and phrasal classes may function as the complement of a light verb in an LVC. Common word classes for complements include nominalized verbs, nouns, adjectives, and adverbs; NPs and PPs may also function as LV complements in some languages (Bowern 2008: 163, 168; Family 2014: 1). The "word class and, more importantly, the semantic restrictions of the [complement]" (Family 2014: 4) are crucial elements to the argument structure of an LVC and the collocation patterns between complements and LVs (Family 2014: 4; Shirtz 2017: 229).

There is no universally accepted term for referring to the complement of an LV, and none of the options currently in use is perfect. For example, Folli *et al.* (2005) refer to it simply as the "NV" (nonverbal) element. Although this term recognizes the prevalence of nonverbal complements, it does not take into account the possibility of using a nonfinite or nominalized verb as the complement. Another option is "coverb" (cf. Bowern 2008; Butt 2010), which has its origins in the literature on serial verb constructions and could therefore cause confusion regarding the nature and (lack of) relationship between serial verb and light verb constructions. The term "host" (Mohanan 1997) avoids making assumptions about the word class of the complement, but it hints at some kind of phonological dependence between the LV and its complement (such as that found between a clitic and its host) and so is less than ideal in this context. Although Family's (2014) term "preverb" is neutral in terms of the word class and lexical status of the complement, it does assume a complement-LV order that is not true of all LVCs cross-linguistically (for example, the complement follows the LV in English). Nevertheless, it does aptly describe the default position of the LV complement not only for Persian (her language of study), but also for other Iranian languages and, presumably, for other

languages that exhibit OV word order.[85] In this dissertation, I use PREVERB (PV) to refer to LV complements in Afghan Wakhi, which as an Iranian language exhibits preverbal LV complements very similar to those found in Persian.[86]

Not all languages utilize LVCs to the same degree. For example, some languages (like English) use relatively few LVCs alongside a more robust class of lexical verbs. However, other languages, like Persian and Afghan Wakhi, do not have a large open class of lexical verbs. Instead, such languages may rely on LVCs to express "a rich variety of verbal semantics" (Family 2014: 7) and to create new predicates. When creating new predicates, speakers do not combine PVs and LVs in some haphazard or unprincipled way. Instead, the "productive creation of new LVCs follows certain underlying rules, intuitively known to all speakers" (Family 2014: 17). Discovering these implicit patterns is the challenge that confronts anyone who wishes to understand and describe these fascinating constructions.

In this section, I have introduced a type of predicative construction known as a light verb construction. Light verb constructions are composed of two elements: a nonverbal or nonfinite verb element, and a verbal element. Both elements work together to contribute meaning, argument structure, and aspect in a way that often equals more than the sum of the parts. A language may use LVCs more or less productively; for those that use them productively, LVCs are usually the preferred method for creating new predicates. Although the vast array of PV+LV collocations in a language may seem random, in fact there are patterns of productivity that

[85] According to Bowern (2008: 177), LVCs often arise diachronically from the reanalysis of object+verb constructions. As a result, the complement of an LV tends to occur in the same syntactic position as the object of a transitive verb in the same language.

[86] In Afghan Wakhi LVCs, sometimes a preverb follows the LV instead of preceding it (cf. (426) in §6.2). LVCs with this syntax resemble other pragmatically marked constructions in the language (cf. §5.2.3.6). Therefore, I analyze such PVs as postposed rather than as postverbs.

emerge through careful study. I undertake this study in the remainder of this chapter, beginning in §6.2 with an introduction to general characteristics of LVCs in Afghan Wakhi.

6.2. Introduction to LVCs in Afghan Wakhi

Having overviewed background information on light verb constructions in §6.1, in this section I introduce the basic features of light verb constructions as found in Afghan Wakhi. As mentioned previously, light verb constructions are very pervasive in Afghan Wakhi. The total number of lexical verbs has been estimated to be around 300 (Grünberg & Stéblin-Kamensky 1988b: 48; Bashir 2009: 833). LVCs are used to communicate the remainder of verbal concepts and thus carry a disproportionately heavy functional load as far as verbal predication is concerned. Thus far, I have identified 26 different LVs with varying degrees of productivity: some occur with nearly 200 distinct PVs, while others collocate with a only a single PV. These LVs combine with a variety of PVs to create a total of 378 unique LVCs (types, not tokens) in my corpus; all of these LVCs are listed in Appendices C–I.[87]

Although 378 may seem like a large number of LVCs, given the small size of my corpus, it is presumably only a small fraction of the total number of LVCs used by speakers of Afghan Wakhi. As an L2 speaker of Afghan Wakhi with 13 years of experience speaking the language, I personally know many more LVCs than just the ones included in this dissertation. However, as a linguist and scientist, I hold to a rigorous definition of "data" that includes recorded naturalistic speech and elicited examples from native speakers but that excludes examples from my own memory and language production capabilities. Only rarely do I include examples from my own L2 knowledge, and then only when absolutely necessary to illustrate a key point.

[87] A small number of LVCs take two different argument structure constructions with different semantic effects. I count such LVCs twice since each construction has a different meaning.

In order to operationalize the process of identifying LVCs as distinct from idioms or metaphoric extensions of verbs, I use a working definition with three criteria:

1. The clearest evidence for an LVC is often the number and type of syntactic arguments explicitly expressed in the clause.

The presence of a direct object distinct from the PV (422) is a clear indication that the PV is part of an LVC, not the object of the verb. In addition, a certain PV+LV collocation may require an argument structure different from that of the LV in its heavy verb function. For example, the argument structure of the verb *t͡sərɐk* 'to do' often includes an agent:SUBJ and a patient:DO. However, the LVC *nəfrɐt t͡sərɐk* 'to hate' (lit., 'to hatred do') takes an experiencer:SUBJ and stimulus:OBL (423).[88]

(422) NP_{SUBJ} NP_{DO} <agt, pat>
[*kɐʂ*] *ɐ=*[***mɔl=v=i***] *ʂpɨn-ij* *t͡sɐr-t.* | |
boy EMPH=livestock=PL.OBL=ACC shepherd-NMLZ do-3SG. SUBJ DO
'The boy is shepherding [lit., 'shepherd doing'] the livestock.'

(423) NP_{SUBJ} PP_{OBL} <exp, stim>
[*wuz*] *ɐ=*[***t͡s=ʊt*** ***xur=ən***] *nəfrɐt* *t͡sɐr-əm.* | |
1SG.NOM EMPH=from=MED donkey=ABL hatred do.1SG SUBJ OBL
'I hate that donkey.' (lit., 'I do hatred from that donkey.')

2. The meaning of an LVC is non-compositional to some degree.

As a result of this non-compositionality, an LVC forms a semantic unit, although not a syntactic one (as I discuss later in this section). The semantic non-compositionality of an LVC may be apparent in the lexical meaning of the predicate, e.g. *qisɐ t͡ʃɨpɐk* 'to gossip' (lit., 'to story pluck'), or it may be evident in one or more non-lexical aspects of meaning that are unique to a certain PV+LV collocation, e.g., *qɐr t͡sərɐk* 'to get angry' (lit., 'to anger do') is volitional and

[88] See §1.6 for a description of semantic roles, grammatical relations, and the argument structure diagrams I use throughout this chapter.

controllable, whereas *qɐr wɔt͡sɐk* ‘to become angry’ (lit., ‘to anger become’) is not. It is also seen in the non-literal meaning of a verb functioning as an LV. For example, the lexical verb *dingɐk* means ‘to hit’, but no literal hitting is involved in the meaning of the LVC *tuxm dingɐk* ‘to sow’ (lit., ‘to seed hit’).

3. The ability of an individual PV to collocate with several different LVs with concomitant semantic and syntactic effects (changes in *Aktionsart*, semantic roles, grammatical relations, etc.) is evidence that the alternate structures involved are LVCs (cf. §6.6).

Even with these operational criteria, it is sometimes difficult to identify the difference between an LVC and a regular verbal predicate because the difference between an NP functioning as a PV vs. one functioning as a direct object can be slight or nearly nonexistent. This difficulty is evidence of the fact that LVCs are not a black-and-white category of predicate; rather, they form a cline that spans from very clear cases on the one end (e.g., LVCs with an ACC-marked direct object) to very fuzzy ones on the other (e.g., LVCs that don’t have a direct object distinct from the PV, LVCs with highly compositional meaning, and weather predicates, to name a few). I include a number of “fuzzy” PV+LV collocations on the basis that they are likely incipient LVCs that do not, as of yet, exhibit all of the properties of prototypical LVCs.

Several phrasal categories may serve as PVs in Afghan Wakhi. The primary phrase types that function as PVs are NPs and APs.[89] For example, the NP *ɔzɔr* ‘harassment’ functions as the PV in (424), while the AP *d͡ʒɐm* ‘gathered’ serves as the PV in (425).

(424) *ɐw=i* *xub* ***ɔzɔr*** ***rend.***
3SG.DIST=ACC good harassment give.2SG
‘Harass it well.’ (25.371)

[89] Recall from §3.1.1 and §3.4.1 that NPs and APs may both be instantiated by a single noun or adjective word, respectively.

(425) *mɐsɐlɐn, kɨli diɔr=ən ɐw rɐis=i ʃurɔ=ʃ* ***d͡ʒɐm wɔt͡s-ən.***
for.example all village=POSS 3SG.DIST chief=EZ council=PL.DFLT gathered become-3PL
'For example, all the villages' village council chiefs gather.' (TEX-0306-2.07)

Simple NPs and APs may be the most common types of PV in Afghan Wakhi, but modified NPs and PPs can also occasionally function as PVs. The phrase *tɐmɔmi zindɐgi* 'all of life' (426) is one example of a complex NP functioning as a PV in conjunction with the LV *winɐk* 'to see'. This LVC takes a single experiencer:SUBJ argument and means something like 'to live a long life' or 'to live out one's days', a concept for which English lacks a single translational equivalent. To communicate the same verbal concept conveyed by the English phrasal verb *pass away*, Afghan Wakhi uses the PP *t͡sʊ bʊjnən* 'from the middle' as a PV in collocation with *rʊʃ͡ʂɐk* 'to go' (427).

(426) *jɐw vit-i pɔtʃɔ ʊt*
3SG.DIST become-PST king and

	NP$_{SUBJ}$					<exp>
digɐ,	∅	*bʊt*	***tɐmɔm=i***	***zɪndɐgi***	*bʊ* ***win-d.***	|
DISC	∅	also	all=EZ	life	also see-PST	SUBJ

'He became king, and he also lived a long life
[lit., 'all of life saw']' (25.617-618)

(427)

		NP$_{SUBJ}$					<pat>
dɔ	*sɔl-ɔnɐ*	[*ji*	*tifl*]	*bʊt*	***t͡sʊ***	***bʊjn=ən***	***nʊ=rʊʃt.***	|
LOC	year-ADV	one	child	also	from middle=ABL	NEG=go-3SG		SUBJ

'On a yearly basis, not one child passes away anymore.'
(lit., 'one child also from the middle does not go') (TEX-0132.45)

In Afghan Wakhi, an LVC is not a syntactic constituent; rather, the PV and LV behave as separate constituents.[90] Evidence for the separateness of the PV and LV includes (a) the ability to reverse the PV-LV order; and (b) the ability of particles and other constituents to interrupt an LVC (i.e., occur between the PV and LV).

[90] Cf. §1.7 for a discussion of constituency in Afghan Wakhi.

As mentioned in §6.1, the PV typically precedes the LV in Afghan Wakhi LVCs (hence the term 'preverb'). However, speakers occasionally reverse the order of the PV and LV (428). Semantically, there is no difference between an LVC token that follows the typical PV-LV order vs. one in which the order is inverted. However, there likely are pragmatic effects associated with the LV-PV word order. The pragmatic implications of word order in LVCs is a topic for future research.

(428) *wuz* *ɕɨ* *tɐt=ər* *ɕɐn-əm,*
1SG.NOM self.GEN father=DAT say-1SG

ɐw *tɐw=i* ***gɔç-t*** ***nɔ-kɔm.***
3SG.DIST 2SG=ACC make-3SG PRIV-successful
'I will tell my father, and he'll fail you!' (lit., 'make you unsuccessful') (05.44)

The PV and LV of an LVC are easily separated by other elements. For example, a negative proclitic almost always attaches directly to the beginning of the LV, as shown in (429), not to the PV. One notable exception is the LVC *bɐs wəzɐjən* 'to be able' (lit., 'to enough come'). As (430) illustrates, this LVC typically takes a negative proclitic on the PV instead of the LV.[91]

(429) *pərindɐ* *t=əm* ***pɐr*** ***nʊ=dʊʃ-t.***
bird to=PROX wing NEG=hit-3SG
'Birds don't fly here.' (25.168)

(430) *wuz* *ti* *tɐt=ər* *çən-ɐk* ***nʊ=bɐs*** ***wəzi-əm.***
1SG.NOM 2SG.GEN father=DAT say-INF NEG=enough come-1SG
'I can't tell your father.' (lit., 'I do not come enough to tell your father.') (04.24)

Another element, such as (but not limited to) a direct object pronoun (431) or a sentential adverb (432), may intervene between the PV and LV of an LVC. In addition, a subject-indexing

[91] My corpus does contain one single example in which a negative clitic is attached to the LV of *bɐs wəzɐjən* instead of the PV: *bɐs=əʂ nʊ=wizit* 'It is not able' (TEX-0130.26). This synchronic variation is suggestive of an ongoing process of reanalysis.

enclitic (433) or an imperfective enclitic (434) may interrupt the LVC by attaching to the PV. This is perhaps the strongest evidence that the PV and LV are separate constituents, since these enclitics only attach to the end of a constituent elsewhere throughout the grammar (cf. SanGregory 2025d: 124; Hughes 2011: 40–41).[92]

(431) *jɐn bərɔdɐr=i gʊl xub* [*ɐl* ***əm*** *t͡sɐr-ən*].
then brother=EZ flower good soft 3SG.PROX do-3PL
'Then brother dear, they soften it well.' (TEX-0108.6)

(432) *ɔxir* [*ʊt͡ʃ t͡ʃiz*]*=əʂ jɔd* ***bʊ*** *nʊ=dərz.*
end none thing=IPFV memory also NEG=take.2SG
'In the end, you don't learn [lit., 'memory take'] anything, either." (01.11)

(433) [*tiɔr=****əm*** *kər-t*].
ready=1SG do-PST
'I readied [it].' (05.06)

(434) *jɐrk=əʂ t͡sɐr-ən,*
work=IPFV do-3PL

[*diwɔl=****əʂ*** *di-nən*], *də ji d͡ʒɐj.*
wall=IPFV hit-3PL LOC one place
'They're working, they're building walls, in a certain place.' (25.542)

Although the PV and LV do not form a constituent in a verbal LVC, an LVC becomes a single unit when it is nominalized. For example, when nominalized via the infinitive suffix *-ʊk ~ -ɐk*, an LVC can function as the argument of a verb just like any other infinitive (cf. §3.2.1.2). In such cases, the default PV-LV order is maintained and is not interruptable. Sentence (435) illustrates this type of construction: the LVC *jupk çɐk* 'to water' (lit., 'to water make') is the direct object of the verb *nʊ=diʃ-əm* 'NEG=know-1SG'. As such, it appears in the preverbal position typical for objects.

[92] See §3.5 for additional description and examples of subject-indexing clitics.

(435) *wuz* ***jupk çɐk*** *nʊ=dif-əm.*
1SG.NOM water do.INF NEG=know-1SG
'I don't know (how) to water [the crops].' (06.098)

Infinitival LVCs can also take the agent nominalizer *-kɨzg* 'AGT', as in (436).[93] This example also shows that an LVC that has been nominalized with the AGT suffix may then be used to modify another noun—in this example, the noun *xur* 'donkey'.

(436) *bi-kɔr* *xur* *wəz-g*
PRIV-work donkey come-PRS

jɐrk tsə͡r-ɐk-kɨzg *xur=i* *ts͡ʊ* *jɐrk=ən* *niç-it-k.*[94]
work do-INF-AGT donkey=ACC from work=ABL pull.out-PRF-PRS
'The idle donkey came and pulled the hardworking donkey away from its work.'
(Wakhi proverb)

Occasionally, speakers of Afghan Wakhi use a PV as a predicate without an accompanying LV. In such cases, they may or may not use a subject-indexing clitic. For example, in (437), the first instance of the NP *ɐrɐkɐt* 'departure' carries a subject-indexing enclitic, but the expected LV (*ts͡ərɐk* 'to do') is absent; this is then followed by a full LVC with the same noun and with the LV expressed. In (438), the first LVC (*ʂɨʂɐ dingɐk* 'to install windows'; lit., 'to glass hit') is complete, but the final NP *rɐng* 'color' has neither a subject-indexing clitic nor the expected LV (*ts͡ərɐk* 'to do'; LVC: *rɐng ts͡ərɐk* 'to paint' (lit., 'to color do')). Nevertheless, *rɐng* is understood as a predicate meaning 'to paint'. In the remainder of this chapter, I focus on LVCs that include an explicit LV to avoid uncertainty regarding the appropriate LV in constructions that lack one.

[93] See §3.2.1.3 for a description of the AGT suffix.

[94] In this example I have chosen to represent the full phonological form of the 'AGT' nominalizer *-kɨzg*. This form is produced following the *-ən* form of the infinitive suffix, e.g., *d͡ʒɔ͡jənkɨzg* 'reader'; however, when the AGT nominalizer follows the *-ʊk ~ -ɐk* form of the infinitive suffix, the resulting [kk] is degeminated, e.g., *çənɐkɨzg* 'speaker, singer'.

(437) *tər xun nɐg rʊʧ͡ʂ-ən,* ***ɐrɐkɐt=ən*** *∅; ɐrɐkɐt ʦ͡ɐr.*
over.to house direction go-1PL departure=1PL ∅ departure do.2SG
'Let's go home, let's leave; get going.' (05.10)

(438) *jɐn wɔz jəm* ***ʂiʂɐ di-nən*** *ʊt* ***reng*** *∅.*
then then 3SG.PROX glass hit-1PL and color ∅
'Then we install windows (in) it and paint (it).' (TEX-0096.33)

In sum, the typical structure of an Afghan Wakhi LVC comprises a nonverbal PV—which may be an NP (simple or complex), AP, or PP—followed by an LV. On some occasions, the PV may follow the LV; this word order likely has pragmatic and / or discourse effects that remain for future study. A verbal LVC is not a single constituent, as evidenced by the ability of other constituents to appear between the PV and LV. However, a nominalized LVC does behave as a cohesive constituent. This introduction to the features of LVCs in Afghan Wakhi provides a foundation for understanding the examples and discussion to come in §6.4.

6.3. Introduction to *Aktionsart* Types

One facet of predicate semantics that I consider in my study of LVCs is *Aktionsart*, or lexical aspect. *Aktionsart* is the internal structure of a situation and is part of the inherent semantics of a predicate (Velupillai 2012: 208). In this dissertation, I determine the *Aktionsart* of a predicate based on whether the situation it refers to is (a) stative vs. dynamic, (b) durative vs. punctual, (c) bounded vs. unbounded, and / or (d) cyclic. A STATIVE situation is unchanging and non-eventive, while a DYNAMIC one involves a process or change over time. A DURATIVE situation continues over a period of time, but a PUNCTUAL situation occurs instantaneously. A situation with an inherent endpoint is BOUNDED; by contrast, an UNBOUNDED situation does not have an inherent endpoint. Finally, a CYCLIC situation is one that can be (but does not have to be) repeated iteratively (Croft 2012: 35–40; Velupillai 2012: 208–209).

Each *Aktionsart* type is defined by a specific combination of these four features. Some combinations are deemed impossible because they are diametrically opposed; for example, a single situation cannot be both stative and punctual, or durative and cyclic (to name a few). I use the five common *Aktionsart* types displayed in Table 6.1 with their defining features and some examples from English.

Table 6.1. *Aktionsart* types and defining features

Type	Stative	Durative	Bounded	Cyclic	Examples
State	✓	✓			sleep, know
Activity		✓			sing, walk
Achievement			✓		explode, die
Accomplishment		✓	✓		melt, learn
Semelfactive			✓	✓	sneeze, stamp

As seen in Table 6.1, States are predicates that are both stative and durative. Activity predicates are durative (they continue for an indeterminate amount of time), while Achievement predicates are only bounded (they involve a change of state that occurs punctually or instantaneously). Accomplishment predicates are both durative and bounded, meaning they progress through time to a natural endpoint.

At first, Semelfactives may seem similar to Achievements, but these *Aktionsart* types differ from each other in two significant ways. First, unlike an Achievement, a Semelfactive predicate does not involve a permanent change of state—the event occurs and the situation reverts to the original state, both instantaneously. Second, although a Semelfactive (lit., 'single event') is by definition a single, instantaneous event, it is an event that can be iterated in an activity-like manner (e.g., a person may cough only once or repeatedly for a period of time). The same is not true of Achievements, since the completion of the event results in an enduring state (a person can only truly die once). Therefore, I use "Semelfactive" to describe predicates with

this inherently instantaneous but repeatable quality, rather than "iterative," which I reserve for the type of grammatical aspect that encodes repetition.

6.4. Five Common LVs and Associated Semantic Patterns

The various LVs of Afghan Wakhi (like those in many languages) fall at various points along a spectrum of productivity: some may collocate with only one or two particular PVs, while others participate in hundreds of different LVCs, each with a unique PV. Similarly, some PVs may collocate with only one certain LV, while others may collocate with two (or more) LVs.

In her study of Persian LVCs, Family takes a bottom-up approach to investigating the sets of collocations, or as she refers to them, "clusters of productivity," between PVs and LVs (2014: 3, 22). She compares hundreds of LVCs, examining the features of both the PV and LV to discover patterns across their PV+LV collocations. Some of the features she considers relevant to discerning clusters of productivity include argument structure, lexical aspect (*Aktionsart*), the semantic properties of the PV, and the ability of certain sets of PVs to alternate with the same LVs (2014: 49, 60). For each LV, she presents a semantic map that illustrates its clusters of productivity and the relationships between those clusters. She describes each cluster individually, including the syntactic and semantic features that contribute to the unique meaning that is characteristic of that cluster.

In this remainder of this chapter, I use Family's work as a guide for my own investigation of LVCs in Afghan Wakhi. I examine PV+LV collocations for the five most frequent LVs in Afghan Wakhi: *t͡sərɐk* 'to do', *çɐk* 'to make', *rədɔwən* 'to give', *dingɐk* 'to hit', and *wɔt͡sɐk* 'to become'. I focus primarily on finding clusters organized by (1) PV word class, (2) similarities in predicate semantics, and (3) LVC argument structure.

My goal in this study is to discover and describe etic clusters of productivity, not to impose my own emic clusters upon the language. Since this is a pioneer effort, I make no claims of perfection. To the contrary, I fully expect that further study involving more LVCs will expand my understanding and shed light on areas that need revision. Nevertheless, this work provides a foundation upon which to build future studies of LVCs in Afghan Wakhi; it also serves as an example for those who wish to investigate LVCs in other under-documented languages.

6.4.1 *t͡sərɐk* 'to do'

Cross-linguistically, verbs meaning 'do' are extremely common LVs. For example, in a survey of sixteen Indo-Iranian languages, Shirtz (2017: 71) finds constructions using cognates of PIE **k^{w}er* 'to do' in fifteen of the sixteen languages. In languages with productive inventories of LVs, 'do' verbs are a favored option for creating new LVCs in collocation with borrowed words (Bowern 2008: 172). In Afghan Wakhi, the verb *t͡sərɐk* 'to do' is the most frequent LV in my corpus, with 178 separate LVCs attested (types, not tokens); it is also the most common LV used in conjunction with loanword PVs, e.g., *kuntrul t͡sərɐk* 'to control'.[95] A full list of LVCs formed with *t͡sərɐk* can be found in Appendix C.

Synchronically, the verb *t͡sərɐk* is only used as an LV. It no longer functions without a PV as a heavy verb meaning 'to do'; instead, the verb *çɐk* 'to make' has been extended to take over this function in the language (cf. example (465) in §6.4.2). Since it only functions as an LV at this point in time, *t͡sərɐk* is a rare exception to the observation that LVs are always identical in form to a lexical verb (cf. Bowern 2008: 167, fn. 8; Butt 2010: 5).

The semantic map for the LV *t͡sərɐk* is given in Figure 6.1. This LV has three transitive clusters of productivity and three intransitive ones; these clusters are represented by the white

[95] See §6.8 for a discussion of innovative LVCs in Afghan Wakhi.

circles branching off from the light gray "transitive" and "intransitive" groups. Each cluster is surrounded by several example PVs that belong to it. The transitive clusters are distinguished primarily by the lexical class of the PV (NP vs. AP), but all three intransitive clusters take an NP as the PV. Therefore, the intransitive clusters are distinguished instead by their *Aktionsart* and by other semantic features of the PV. I describe and provide examples for each cluster of productivity in §6.4.1.1 – §6.4.1.6. Note that the final digit of each sub-section number corresponds to the cluster number in Figure 6.1; the same is true for the clusters in subsequent semantic maps and the sections devoted to them.

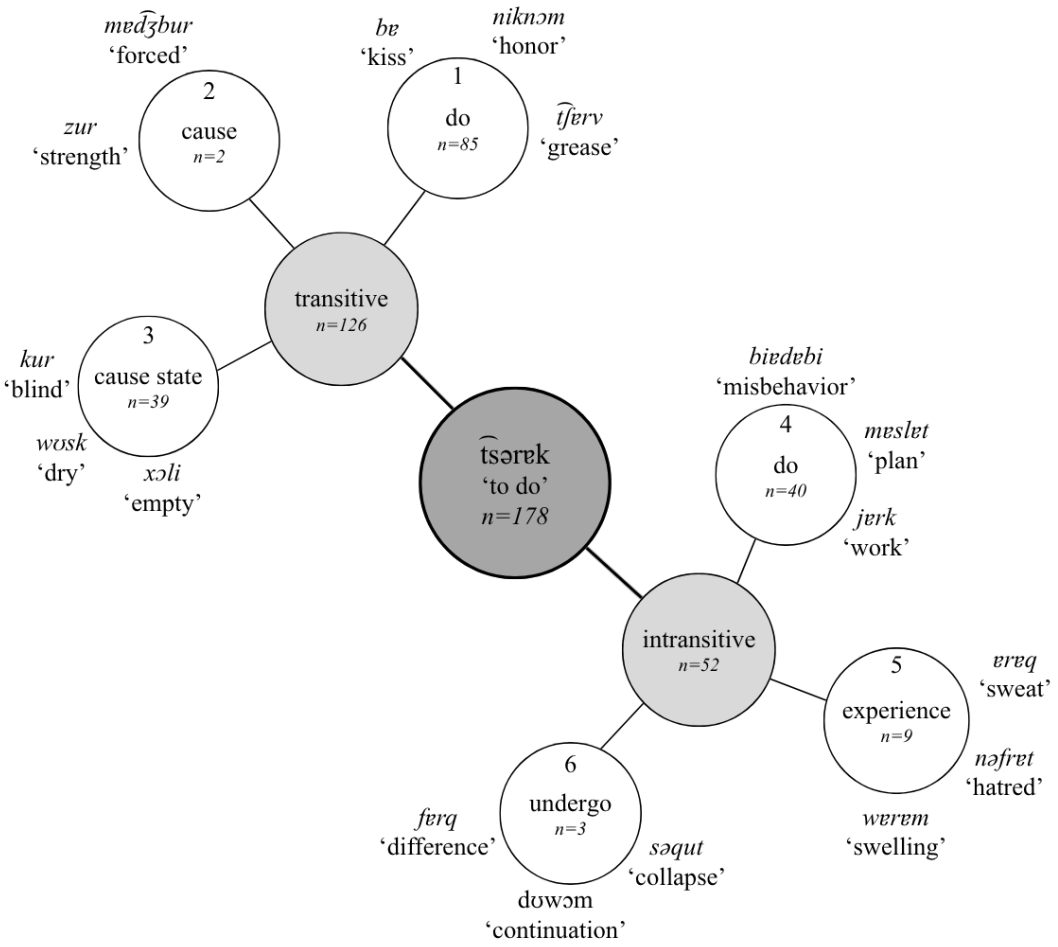


Figure 6.1. Semantic map for *t͡sərɐk* 'to do'

6.4.1.1 TR: Do

The first and largest cluster of LVCs formed with *t͡sərɐk* is the transitive 'do' (TR: DO) cluster, with 85 members (i.e., tokens). Most of these LVCs have a nominal NP as PV, although a few take a PP as their PV. All of them take at least one obligatory second participant that is distinct from the PV, although not all of these participants have the same semantic role or grammatical relation. The *Aktionsart* of each LVC in this cluster differs depending on the inherent properties of each PV; therefore, the construction that represents this cluster is unspecified for *Aktionsart*. The constructional specifications for the TR: DO cluster are given in Table 6.2.

Table 6.2. *t͡sərɐk*: TR: DO construction

PV:	NP, PP
Aktionsart:	Depends on PV

All *Aktionsart* types except States and Semelfactives are represented in the TR: DO cluster, as the examples below illustrate. The LVC *ðɨs t͡sərɐk* 'to make dough' (lit., 'to dough do') (439) and the first LVC in (440), *jʊçk t͡sərɐk* 'to learn', in this context 'to raise' (lit., 'to learning do') are both Accomplishment predicates. In the second clause of (440), the LVC *isɔb t͡sərɐk* 'to count' (lit., 'to accounting do'), is an Activity predicate. The LVC *bɐ t͡sərɐk* 'to kiss' (lit., 'to kiss do') (441) is an Achievement predicate. Although each of these predicates has a different *Aktionsart*, all four are transitive. Sentences (439) and (440) are prototypical transitive constructions with an agent:SUBJ and patient:DO, but the LVC in (441) is an eventive surface contact predicate that takes an agent:SUBJ and a goal:DO. The direct objects of the LVCs in this cluster are either unmarked for case (Default, e.g., *stɔr* 'star' in (440)) or differentially marked via the ACC case marker (e.g., *jɐw=i* '3SG.DIST=ACC' in (441)).

(439) NP_{SUBJ} NP_{DO}
[*wuz*] *wudg* ***ðis*** ***t͡sɐr-əm*** [*ɕʊt͡ʃ=i*].
1SG.NOM today dough do-1SG bread=ACC
'I will make bread dough today.' (lit., 'I will dough make bread.')

(440) NP_{SUBJ} NP_{DO}
[*tɐw*] [*t͡sət͡sɔxt ðəwɟd*]*=ʊt* ***jʊçk*** ***kər-k=i***
2SG what.kind daughter=2SG learning do-PRS=SPEC

NP_{SUBJ} NP_{DO}
ki [*jəm*] [*stɔr*] ***isɔb*** ***t͡sɐr-t****?*
COMP 3SG.PROX star accounting do-3SG
'What kind of daughter have you raised that she counts the stars [lit., 'accounting does stars', i.e., 'daydreams']?' (04.41)

(441) *də* *ɟɐr=ən* *ki* *ti* *qwɐt* *nʊ=ɟɐt,*
COM stone=ABL COMP 2SG.GEN strength NEG=arrive.3SG

NP_{SUBJ} NP_{DO}
∅ [*jɐw=i*] ***bɐ*** ***t͡sɐr,*** *ʃʊxəs.*
∅ 3SG.DIST=ACC kiss do.2SG pass.2SG
'With a stone that you're not strong enough to move [lit., 'your strength doesn't arrive'], kiss it [lit., 'kiss do it'] and pass on.' (Wakhi proverb)

Several sample LVCs from the TR: DO cluster are given in Table 6.3, organized into eight groups by their associated argument structures. All of these groups have two obligatory arguments, but the semantic roles of those arguments and the grammatical relations they map to are different for each group. The argument structure for Group 7 includes a complement clause that functions as a direct object. Recall from §1.6.2 that I use the abbreviation CC_{DO} for such complement clauses.

Table 6.3. Sample *t͡sərɐk*: TR: DO LVCs

	LVC	Gloss	Meaning	Argument Structure
1	*ðis t͡sərɐk* *niknɔm t͡sərɐk* *pist t͡sərɐk*	dough do good-name do skin do	‘to make dough’ ‘to honor’ ‘to peel’	<agt, pat> | | SUBJ DO
2	*ɐj t͡sərɐk* *d͡ʒɐm t͡sərɐk* *vər t͡sərɐk*	driving do gathering do load do	‘to drive’ ‘to gather’ ‘to load’	<agt, th> | | SUBJ DO
3	*pɔsbɔnd t͡sərɐk* *tir t͡sərɐk*	bandage do arrow do	‘to bandage’ ‘to shoot’	<agt, loc> | | SUBJ DO
4	*bɐ t͡sərɐk* *jɔd t͡sərɐk*	kiss do memory do	‘to kiss’ ‘to remember’	<agt, gl> | | SUBJ DO
5	*bɐxʃiʃ t͡sərɐk* *tɐʃri t͡sərɐk*	forgiveness do description do	‘to forgive’ ‘to describe’	<agt, stim> | | SUBJ DO
6	*tɐjin t͡sərɐk*	noticing do	‘to notice’	<exp, stim> | | SUBJ DO
7	*fikr t͡sərɐk* *nəsivt t͡sərɐk* *ʃɔkɔjɐt t͡sərɐk*	thought do advice do complaint do	‘to think’ ‘to advise’ ‘to complain’	<agt, sit> | | SUBJ CC_{DO}
8	*t͡ʃɔplusi t͡sərɐk* *kəmʊk t͡sərɐk*	flattery do help do	‘to flatter’ ‘to help’	<agt, rec> | | SUBJ IO

Group 1 of the TR: DO LVCs are prototypical transitive predicates with the argument structure agent:SUBJ and patient:DO. As described above, the LVCs in (439) and (440) both have this argument structure and therefore belong to this group.

The LVCs in Group 2 of this cluster are also fairly prototypical, with an agent:SUBJ and a theme:DO that changes location but is otherwise unaffected. Example (442) illustrates this argument structure.

(442) NP_{SUBJ} NP_{DO}
*jɔ skɐ bu d͡zuɟ ∅ [ʊt] **ts͡ɐr-ən vər**, jɔ tru d͡zuɟ.*
or on two yak ∅ 3SG.MED do-1PL load or three yak
'Either on two yaks we load it, or (on) three yaks.' (TEX-0118.32)

Group 3 includes LVCs that take an agent:SUBJ and location:DO. I analyze the direct objects of the LVCs in this group as Locations because they are merely a static point at which the event expressed by the predicate occurs. For example, in (443), the NP *ʐɨ dɐst pɨd=v=i* 'my hands and feet' is the point on the patient's body where the doctor applied the bandage.

(443) NP_{SUBJ} NP_{DO}
*jɐn [ɖɔkdɐr] wɐxt=i ki [ʐɨ dɐst pɨd=v=i] **pɔsbɔnd kər-ti** . . .*
then doctor time=EZ COMP 1SG.GEN hand foot=PL.OBL=ACC bandage do-PST
'Then when the doctor bandaged my hands and feet . . .' (24.09)

The LVC *jɔd t͡sərɐk* 'to remember' (lit., 'to memory do') is currently the only member of Group 4. This LVC refers to an agentive, volitional act of remembering; therefore, I analyze it as having an agent:SUBJ. The direct object of this LVC is a Goal because it is the metaphorical destination toward which one directs their act of remembering. Sentence (444), which comes from my own L2 knowledge of Afghan Wakhi, illustrates this LVC and its argument structure.

(444) NP_{SUBJ} NP_{DO}
*[tu] bɔjɐd [çɨ tɐt nəsiɐt] **jɔd t͡sɐr**.*
2SG.NOM must self.GEN father advice memory do.2SG
'You must remember your father's advice.' (L2 knowledge)

Group 5 also includes two LVCs that I analyze as having an agent:SUBJ and stimulus:DO because the predicational meanings they express are inherently volitional responses to external stimuli. One example from this group is the LVC *bɐxʃi͡ʃ t͡sərɐk* 'to forgive' (lit., 'to forgiveness do') (445).

(445) NP_{SUBJ} NP_{DO}
[*wuz*] [*ɐw*] *tɐr* ***bɐxʃiʃ=əm*** ∅.
1SG.NOM 3SG.DIST 2SG.DAT forgiveness=1SG ∅
'I will forgive it [i.e., what was done] for you.' (25.586)

Another single-member group is Group 6, which contains the perception predicate *tɐjin t͡sərɐk* 'to notice' (lit., 'to noticing do'). This LVC takes an experiencer:SUBJ and a stimulus:DO, as seen in (446).

(446) NP_{SUBJ} NP_{DO}
[*wuz*]*=əm* *wudg* [*ji nəfɐr*] ***tɐjin*** ***kər-ti***.
1SG.NOM=1SG today one person noticing do-PST
'I noticed someone today.' (lit., 'I noticing did someone today.')

The LVCs in Group 7 of the TR: DO cluster are perception, utterance, and cognition (PCU) predicates that take an agent:SUBJ and situation:DO. The content of the perception, cognition, or utterance is coded as a finite complement cause that, like other finite complement clauses in Afghan Wakhi, occurs in postverbal position (cf. §1.6.2 and §1.7). Sentence (447) provides an example from this cluster.

(447) NP_{SUBJ}
∅ ***fikr=əm*** ***kər-ti***
∅ thought=1SG do-PST

CC_{DO}
[*ki, xɐj, ɣɐ ʃɐk jɐrk=əm kər-k*].
COMP DISC INTS bad work=1SG do-PRS
'I thought that, "Well, I did a very bad thing."' (15.14)

Group 8, the final group of the TR: DO cluster, comprises a set of LVCs with a different formal argument structure from the other seven groups. These LVCs take an agent:SUBJ and a Dative-marked recipient:IO, but no direct object. Most of the LVCs in this group, such as *t͡ʃɔplusi t͡sərɐk* 'to flatter' (lit., 'to flattery do') in (448), resemble predicates of transfer in that the effect of the predicate is "given," so to speak, to the Recipient. However, when the LVC *kəmʊk t͡sərɐk*

'to help' (lit., 'to help do') is used with this argument structure,[96] it conveys the meaning that the Recipient argument is actually affected, without contributing anything to the situation. The use of the Dative to mark an affected participant is unique neither to this group of LVCs (cf. §6.4.3.1 and §6.4.4.1) nor to Afghan Wakhi: similar uses of the Dative have been observed for both German (De Knop & Mollica 2017: 219) and Polish (Wierzbicka 2009: 157), to name just two examples.

(448) NP_{SUBJ} NP_{IO}
*nɐʝdin ∅ bɔjɐd də sɐlɔm=ən [çɨ ɐmsɔjɐ=r] **ʧɔplusi mu=ʦɐr**.*
morning ∅ must COM salaam=ABL self.GEN neighbor=DAT flattery NEG=do.2SG
'In the morning, do not flatter your neighbor [lit., 'do not flatter do to your neighbor'] with greetings.' (i.e., 'Do not greet your neighbor with flattery.') (Prov. 27:14)

(449) NP_{SUBJ} NP_{IO}
*dr=ɐ [ɖɔkdɐr] [mɐr] **kəmuk kər-ti**.*
at=DIST doctor 1SG.DAT help do-PST
'There the doctor helped me [lit., 'did help to me'].' (24.08)

6.4.1.2 TR: Cause

The second cluster of LVCs associated with *ʦ͡ərɐk* 'to do' is the transitive cause (TR: CAUSE) cluster. This cluster includes two LVCs: *mɐʤ͡bur ʦ͡ərɐk* 'to force' (lit., 'to force do') and *zur ʦ͡ərɐk* 'to cause' (lit., 'to strength do'). Both LVCs have a nominal NP as their PV and are used to form periphrastic causatives in Afghan Wakhi (cf. §7.1.2). This cluster takes a causer:SUBJ, causee:OBJ, and situation:OBJ, as diagrammed in Table 6.4. Examples of causative constructions formed with *mɐʤ͡bur ʦ͡ərɐk* and *zur ʦ͡ərɐk* can be seen in (450) and (451), respectively. For further discussion of periphrastic causative constructions, see §7.1.2.

[96] The LVC *kəmɔk ʦ͡ərɐk* 'to help' can also be used intransitively with different semantics, as I describe in §6.4.1.4.

Table 6.4. *t͡sərɐk*: FORCE LVCs

LVC	Gloss	Meaning	Argument Structure		
mɐd͡ʒbur t͡sərɐk	forced do	'to force'	<csr,	cse,	sit>
zur t͡sərɐk	strength do	'to cause'	|	|	|
			SUBJ	OBJ	CC_{OBJ}

(450) NP_{SUBJ} NP_{OBJ}
[*zɻ* *nɐn*] [*mɐzˌ=i*] ***mɐd͡ʒbur*** ***t͡sɐr-t***
1SG.GEN mother 1SG=ACC forced do-3SG

CC_{OBJ}
[*ki* *wuz* *çɻ* *mɔl=v=i* *ðit͡s-əm*].
COMP 1SG.NOM self.GEN livestock=PL.OBL=ACC milk-1SG
'My mother forces me to milk my livestock.'
(lit., 'My mother forced does me that I milk my livestock.')

(451) NP_{SUBJ} NP_{OBJ}
[*wuz*] [*çɻ* *zɐ=i*] ***zur*** ***t͡sɐr-əm***
1SG.NOM self.GEN child=ACC strength do-1SG

CC_{OBJ}
[*ki* ∅ *çʊt͡ʃ* ***jit***].
COMP ∅ bread eat.3SG
'I make my child eat bread.' (lit., 'I strength do my child that (3SG) eats bread.')

6.4.1.3 TR: Cause State

The third cluster for *t͡sərɐk* 'to do' comprises LVCs that take an AP as their PV. I call this the TR: CAUSE STATE cluster because the subject causes the direct object to enter the state expressed by the PV. This cluster includes 39 LVCs, all of which are Achievement predicates. The constructional specifications for this cluster are given in Table 6.5, and several examples of LVCs and their associated argument structures in Table 6.6.

Table 6.5. *t͡sərɐk*: TR: CAUSE STATE construction

PV:	AP
Aktionsart:	Achievement

Table 6.6. Sample *t͡sərɐk*: TR: CAUSE STATE LVCs

	LVC	Gloss	Meaning	Argument Structure	
	bidɔr t͡sərɐk	awake do	'to awaken'	<agt,	pat>
1	*xɐjt͡ʃ t͡sərɐk*	wet do	'to wet'	|	|
	sɐvz t͡sərɐk	green do	'to grow'	SUBJ	DO
	prʊt t͡sərɐk	front do	'to move forward'	<agt,	th>
2	*tit t͡sərɐk*	scattered do	'to scatter'	|	|
	xɔli t͡sərɐk	empty do	'to pour'	SUBJ	DO

Group 1 in the TR: CAUSE STATE cluster comprises LVCs that take an agent:SUBJ and patient:DO. The LVC *xɐjt͡ʃ t͡sərɐk* 'to wet' (lit., 'to wet do') is a typical predicate from this cluster. In (452), it is clear that the subject of this LVC (expressed by a subject-indexing clitic) is agentive, while the direct object (a dishcloth, anaphorically referred to via a 3SG pronoun) is an affected Patient.

(452) NP_{SUBJ} NP_{DO}
∅ ***xɐjt͡ʃ=əm*** [*ɐw*] ***kər-ti,*** *wɔz əm ji lɔj vuzəm-di.*
∅ wet=1SG 3SG.DIST do-PST then 3SG.PROX one time wring-PST
'I got it [dishcloth] wet [lit., 'wet did it'], then I wrung it out once.' (17.07)

The second group of LVCs in this cluster take an unaffected theme:DO that changes location as a result of the action performed upon it by the agent:SUBJ. One such LVC is *xɔli t͡sərɐk* 'to empty' (lit., 'to empty do'), as seen in (453).

(453) NP_{SUBJ} NP_{DO}
[*wuz*]*=əm tiz* [*jupk*] ***xɔli*** ***kər-ti.***
1SG.NOM=1SG fast water empty do-PST
'I quickly poured [lit., 'empty did'] the water.' (18.04)

6.4.1.4 ITR: Do

The fourth cluster of productivity for *t͡sərɐk*, and the first of the intransitive clusters, is the intransitive 'do' (ITR: DO) cluster, which includes 42 LVCs. The LVCs in this cluster take nominal NPs as their PVs, but the *Aktionsart* of each LVC depends on the qualities of the PV. Table 6.7 displays the specifications for the ITR: DO construction. The inventory of argument structures and some sample LVCs that use them are displayed in Table 6.8.

Table 6.7. *t͡sərɐk*: ITR: DO construction

PV:	NP
Aktionsart:	Depends on PV

Table 6.8. Sample *t͡sərɐk*: ITR: DO LVCs

	LVC	Gloss	Meaning	Argument Structure	
1	*ɐrɐkɐt t͡sərɐk*	departure do	'to depart'	<agt>	
	nɐng t͡sərɐk	crouch do	'to crouch'	|	
	zɪndɐgɪj t͡sərɐk	life do	'to live'	SUBJ	
2	*ɐmlɐ t͡sərɐk*	attack do	'to attack'	<agt,	gl>
	ɐmr t͡sərɐk	command do	'to command'	|	|
	fəjr t͡sərɐk	fire do	'to fire'	SUBJ	(OBL ['on'])
3	*ɐrusi t͡sərɐk*	wedding do	'to get married'	<agt,	com>
	kəmʊk t͡sərɐk	help do	'to help'	|	|
	qɐr t͡sərɐk	anger do	'to get angry'	SUBJ	(OBL ['COM'+ABL])
4	*mɔfɪzɐt t͡sərɐk*	guard do	'to guard'	<agt,	src>
	qɐrz t͡sərɐk	loan do	'to borrow'	|	|
				SUBJ	(OBL ['from'+ABL])

Group 1 in the ITR: DO cluster comprises intransitive LVCs that have a sole agent:SUBJ argument. The LVC *zɪndɐgɪj t͡sərɐk* 'to live' (lit., 'to life do') in (454) is an example of an intransitive Activity predicate from this group.

(454) NP_{SUBJ}

ini ji nɐw ðɐs ɐʒɣɔl [*sɐk*] *d=əm xun* ***zɪndɐ-gɨj*** ***t͡sɐr-ən****.*

DISC one nine ten family 1PL.NOM LOC=PROX house alive-NMLZ do-1PL

'So [as] nine or ten family members we live in this house.' (TEX-0023.096)

In contrast to Group 1, which has only a single argument, the remaining groups of the ITR: DO cluster take an optional oblique that maps to a different semantic argument for each group. Group 2 comprises Semelfactive predicates that take a syntactically optional goal:OBL headed by the preposition *skɐ* 'on'.[97] One example from this group is the LVC *fəjr t͡sərɐk* 'to fire' (lit., 'to fire do'), as seen in (455).

(455) NP_{SUBJ} PP_{OBL}

[*wuz*] *wudg* [*sk=əm d͡ʒɔndɔr*] ***fəjr t͡sɐr=əm****.*

1SG.NOM today on=PROX MP.sheep fire do-1SG

'Today I will shoot at Marco Polo sheep.' (lit., 'fire do on Marco Polo sheep')

Group 3 in this cluster consists of Achievement and Activity predicates that take an optional comitative:OBL. This Comitative argument is coded as a PP that is headed by *də* 'COM'; this preposition takes an Ablative-marked object. An example of an Achievement predicate that does not (but could) have a Comitative argument is given in (456). The LVC *kəmʊk t͡sərɐk* 'to help', discussed in §6.4.1.1 as an example of a transitive LVC with a Dative object, can also occur in the Group 3 construction of ITR: DO. In this use, the Comitative argument of *kəmʊk t͡sərɐk* is understood as an already-active participant in the situation, whom the Agent joins in their efforts. This use of the Comitative is clear in the narrative context of (457), in which the puppy joins the boy in his fight to slay an ogre.

(456) NP_{SUBJ}

[*tu*] *bɔjɐd* ***ɐrusi*** ***t͡sɐr****.*

2SG.NOM must marriage do.2SG

'You must get married [lit., 'marriage do'].' (02.05)

[97] The preposition *skɐ* 'on' frequently cliticizes to reduced forms of the demonstratives to produce forms such as *sk=əm* 'on=PROX', *sk=ʊt* 'on=MED'.

(457) NP$_{SUBJ}$ PP$_{OBL}$
ʊt [jʊt xɛnduní] [də=m kɐ̯s=ən] **kəmuk ʦɛr-t,** sɐ̯ji=ɐ?
and MED puppy COM=PROX boy=ABL help do-3SG okay=Q
'And the puppy helps the boy [lit., 'with the boy helps'], okay?' (25.126)

The fourth group of this cluster comprises two LVCs that take an optional source:OBL coded as a PP headed by the preposition *ʦʊ* 'from', which takes an Ablative-marked object. Sentence (458) gives an example with *məfizɛt ʦərɐk* 'to guard' (lit., 'to guard do').

(458) NP$_{SUBJ}$ PP$_{OBL}$
[ɐskɐr] ɐ=[ʦ=əm ʤɐ̯j=ən] **məfizɛt ʦɛr-t.**
soldier EMPH=from=PROX place=ABL guard do-3SG
'The soldier is guarding this place.' (lit., 'The solider is guard doing from this place.')

6.4.1.5 ITR: Experience

The fifth cluster of LVCs for *ʦərɐk* 'to do' is the ITR: EXPERIENCE cluster. The LVCs in this cluster all express states experienced by the subject, as shown in the constructional specifications in Table 6.9. This cluster includes three different argument structure constructions. All three have an Experiencer, but two also take an optional Stimulus (albeit with different coding properties). These argument structures are given in Table 6.10.

Table 6.9. *ʦərɐk*: ITR: EXPERIENCE construction

PV:	NP
Aktionsart:	State

Table 6.10. Sample *t͡sərɐk*: ITR: EXPERIENCE LVCs

	LVC	Gloss	Meaning	Argument Structure	
	ɐrɐq t͡sərɐk	sweat do	'to sweat'	<exp>	
1	*wɐrɐm t͡sərɐk*	swelling do	'to swell'	|	
	xfɐ t͡sərɐk	upset do	'to get upset'	SUBJ	
	nəfrɐt t͡sərɐk	hatred do	'to hate'	<exp,	stim>
2	*fɔjdɐ t͡sərɐk*	benefit do	'to benefit'	|	|
				SUBJ	(OBL ['from'+ABL])
	ɪftɪxɔr t͡sərɐk	pride do	'to be proud'	<exp,	stim>
3	*qɐr t͡sərɐk*	anger do	'to be angry'	|	|
				SUBJ	(OBL ['LOC'])

Group 1 of the ITR: EXPERIENCE cluster has only an experiencer:SUBJ. This argument structure construction is illustrated by the LVC *ɐrɐq t͡sərɐk* 'to sweat' in (459). The subject of this predicate clearly has no control over whether he sweats or not; he merely experiences this involuntary bodily process.

(459) *spɔt͡sən jɐrk ɣɐ ziɔt,*
1PL.GEN work INTS a.lot

NP$_{SUBJ}$
[*wuz*]*=əʂ ki* ***ɐrɐq t͡sɐr-əm,***
1SG.NOM=IPFV COMP sweat do-1SG

jɐn bʊt zɨ̣ sɐr=əʂ ɣɐ bi-zib=əʂ wɔst.
then also 1SG.GEN head=IPFV INTS PRIV-beauty=IPFV become.3SG
'We have a lot of work, (and) when I sweat, then my head gets really ugly.' (06.003)

The second group in this cluster comprises LVCs that take an experiencer:SUBJ and a stimulus:OBL coded as a *t͡sʊ* 'from' + Ablative PP. The LVC *nəfrɐt t͡sərɐk* 'to hate' (lit., 'to hatred do') in (460) belongs to this group.

(460) NP$_{SUBJ}$ PP$_{OBL}$
[*wuz*] *ɐ=*[*t͡s=ʊt* *xur=ən*] ***nəfrɐt t͡sɐr-əm.***
1SG.NOM EMPH=from=MED donkey=ABL hatred do-PST
'I hate that donkey.' (lit., 'I do hatred from that donkey.')

The LVCs in Group 3 of the ITR: EXPERIENCE cluster also take an experiencer:SUBJ and a stimulus:OBL. However, for this group, the Stimulus is coded as a *skɐ* 'on' PP. Sentence (461) provides an example using the LVC *ɪftɪxɔr t͡sərɐk* 'to be proud' (lit., 'to pride do').

(461) NP$_{SUBJ}$ PP$_{OBL}$
[*tɐt*] [*skɐ çɨ* *pʊtɪ*] ***ɪftɪxɔr t͡sɐr-t.***
father on self.GEN son pride do-3SG
'The father is proud of his son.'

6.4.1.6 ITR: Undergo

The sixth and final cluster of productivity for the LV *t͡sərɐk* is the ITR: UNDERGO cluster. This cluster is very similar to the ITR: EXPERIENCE cluster; the primary difference between the two is that the LVCs in the ITR: EXPERIENCE cluster are States experienced by the subject, while none of the LVCs in the ITR: UNDERGO cluster are States.

The LVCs belonging to the ITR: UNDERGO cluster express a situation that the subject undergoes. The LVCs in this cluster are Activity or Achievement predicates that take a nominal NP as their PV. These specifications are displayed in Table 6.11. As seen in Table 6.12, all three of the LVCs in this cluster are intransitive.

Table 6.11. *t͡sərɐk*: ITR: UNDERGO construction

PV:	NP
Aktionsart:	Activity, Achievement

Table 6.12. Sample *t͡sərɐk*: ITR: UNDERGO LVCs

LVC	Gloss	Meaning	Argument Structure
dʊwɔm t͡sərɐk	continuation do	'to continue'	<th>
fɐrq t͡sərɐk	difference do	'to differ'	|
səqut t͡sərɐk	falling do	'to fall / collapse'	SUBJ

I analyze the single argument of the LVCs in the ITR: UNDERGO cluster as a Theme because it changes location in a more or less metaphorical sense. For example, the LVC *səqut t͡sərɐk* 'to collapse' (lit., 'to collapse do') in (462) is an Achievement predicate that refers to a fall from power, not a literal change in elevation.

(462) *də wɐtɐn=əm ki wəz-di*
LOC homeland=1SG COMP come-PST

NP$_{SUBJ}$
[*ukumɐt=i nɐd͡ʒib*] ***səqut kər-ti.***
government=EZ Najib collapse do-PST
'When I got home, Najib's government collapsed [lit., 'collapse did].' (TEX-0023.069)

The LVC *dʊwɔm t͡sɐrt* 'to continue' in (463) is an example of an Activity predicate that may be coerced into an Achievement by adding an adverbial PP that expresses an endpoint for the situation (464).

(463) NP$_{SUBJ}$
wudg [*ʐi jɐrk*] *ziɔt* ***dʊwɔm kər-t.***
today 1SG.GEN work a.lot continuation do-PST
'Today my work lasted [lit., 'continuation did'] forever.'

(464) NP$_{SUBJ}$
[*jʊt*] *tru rəwɔr jɔ dɐ ruz jʊt* ***dʊwɔm t͡sɐr-t.***
MED three day or ten day MED continuation do-3SG
'That [wall-building] continues [for] three days to ten days.'
(lit., 'That [wall-building] (for) three days, or ten days that continuation does.')
(TEX-0096.07)

In this section, I have discussed the light verb *t͡sərɐk* 'to do'. This verb is the most productive LV in Afghan Wakhi, as well as the only LV that no longer functions as a heavy

(lexical) verb. Six clusters of productivity are associated with this LV; of these, three are transitive and three are intransitive. Some of these clusters exhibit similarities to those found for the LV *çɐk* 'to make', which is the topic of the next section.

6.4.2 *Çɐk* 'to make'

In Afghan Wakhi, the verb *çɐk* is a semantically heavy verb meaning 'to make', as seen in (465). The verb *çɐk* has also taken over from *t͡sərɐk* (cf. §6.4.1) as the semantically heavy verb meaning 'to do', in that it need not occur as part of an LVC. An example of *çɐk* used to mean 'to do' is given in (466).

(465) *pɔtʃɔ nɔziun kʊnd digɐ çɨ nɔziun pʊtr=v=ər pt̪ɔk* ***gɔç-t.***
king favored wife DISC self.GEN favored son=PL.OBL=DAT biscuit make-3SG
'The king's beloved wife makes biscuits for her favored sons.' (25.035)

(466) *tu=ʂ t͡ʃiz* ***gɔç?***
2SG.NOM=IPFV what make.2SG
'What are you doing?' (TEX-0014-1.37)

The verb *çɐk* also functions as a light verb. The LVCs in which *çɐk* appears exhibit many similarities to those created with *t͡sərɐk*. In my corpus, I have identified 17 types of LVCs formed with *çɐk* thus far. These LVCs form two clusters of productivity: DO and CAUSE STATE, as illustrated in the semantic map in Figure 6.2. I discuss these clusters in §6.4.2.1 and §6.4.2.2, respectively. A full list of LVCs in my corpus that are formed with *çɐk* is given in Appendix D.

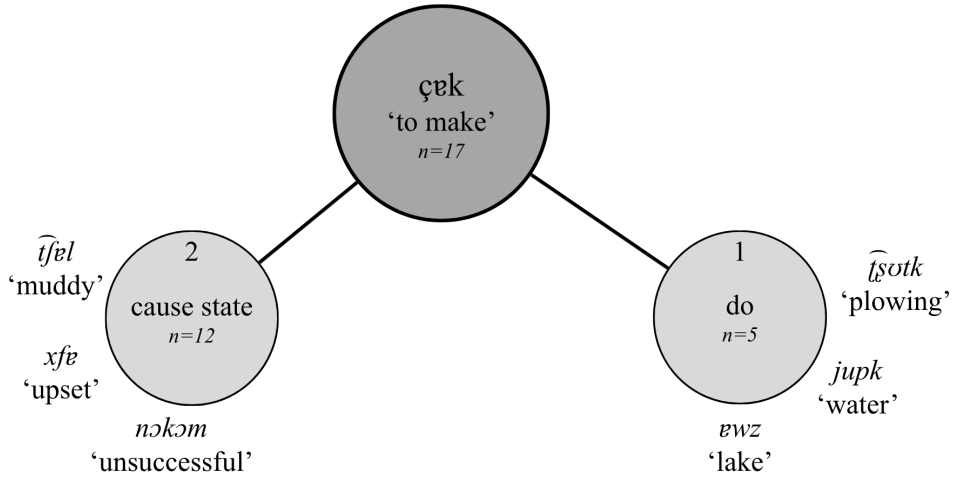


Figure 6.2. Semantic map for *çɐk* ‘to make’

6.4.2.1 Do

The first cluster for *çɐk* is the DO cluster. This cluster is an extension of the ‘to do’ function of *çɐk* as a heavy verb. The LVCs in this cluster are transitive Activity or Accomplishment predicates that take a nominal NP as their PV. These constructional specifications are displayed in Table 6.13. The argument structure for this cluster is shown in Table 6.14.

Table 6.13. Sample *çɐk*: DO construction

PV:	NP
Aktionsart:	Activity, Accomplishment

Table 6.14. Sample *çɐk*: DO LVCs

LVC	Gloss	Meaning	Argument Structure	
jupk çɐk	water make	‘to water’	<agt,	pat>
tindɐ çɐk	spinning make	‘to spin (fiber)’	|	|
t͡ʂʊtk çɐk	plowing make	‘to plow’	SUBJ	DO
wərg çɐk	furrow make	‘to furrow’		
ɐwz çɐk	lake make	‘to soak’		

The DO cluster comprises prototypical transitive predicates that have an agent:SUBJ and patient:DO. The distinction between Activity and Accomplishment predicates in this group is based (a) on the inherent features of the PV, and (b) on the real-world properties of the Patient referent in a particular clause. For example, in (467) the LVC *tindɐ çɐk* 'to spin' (lit., 'to spinning do') is an Activity predicate because spinning yarn does not necessarily have an inherent endpoint. In contrast, *wərg çɐk* 'to furrow' (lit., 'to furrow do') as used in (468) is an Accomplishment predicate because the Patient (the field) is bounded.

(467) NP_{SUBJ} NP_{DO}
[*çinɐn*] [*ʒitr*] ***tindɐ*** ***gɔç-t***.
woman yarn spinning make-3SG
'The woman is spinning yarn.' (lit., 'The woman is spinning making yarn.')

(468) NP_{SUBJ} NP_{DO}
∅ [*jəm=i*] *pɐs* ***wərg*** ***gɔ-nən***.
∅ 3SG.PROX=ACC afterward furrow make-1PL
'Afterward we furrow it [the field].' (lit., 'Afterward we furrow make it.') (TEX-0086.06)

For some of the LVCs in this cluster, the direct object is somewhat Location-like because it is the point in space where the situation occurs. The LVC *wərg çɐk* 'to furrow' (468) is one such predicate in this cluster; another is the LVC *ɐwz çɐk* 'to soak' (lit., 'to lake make') in (469). However, since the direct objects of these predicates are also clearly affected, I analyze them as Patients.

(469) NP_{SUBJ} NP_{DO}
[*jəm jupk*] [*mɐz̨=i*] *d͡zɐq=i* *dəgɐr* ***ɐwz*** ***gɔç-ti***.
PROX water 1SG=ACC middle=EZ again lake make-PST
'This water soaked me halfway again.' (15.14)

6.4.2.2 Cause State

The second cluster of productivity for *çɐk* is the CAUSE STATE cluster, which includes 12 LVCs. Like the DO cluster, the CAUSE STATE cluster is transitive; however, the PVs used in this cluster are APs. The LVCs in this cluster cause the syntactic direct object to enter a state

characterized by the quality of the PV; therefore, these LVCs are telic Accomplishment predicates. The features of the CAUSE STATE construction are given in Table 6.15. As seen in Table 6.16, this cluster is subdivided into three groups by argument structure.

Table 6.15. *çɐk*: CAUSE STATE construction

PV:	AP
Aktionsart:	Accomplishment

Table 6.16. Sample *çɐk*: CAUSE STATE LVCs

	LVC	Gloss	Meaning	Argument Structure	
	nɔkɔm çɐk	unsuccessful make	'to fail'	<agt,	pat>
1	*pɐxpɐx çɐk*	flat-flat make	'to creep'	|	|
	psjupk çɐk	drowned make	'to drown'	SUBJ	DO
	mɐrum çɐk	excluded make	'to expel'	<agt,	th>
2	*tit çɐk*	scattered make	'to scatter'	|	|
				SUBJ	DO
				<agt,	loc>
3	*t͡ʃɐl çɐk*	muddy make	'to muddy'	|	|
				SUBJ	DO

Group 1 of the Cause State cluster comprises LVCs that taken an agent:SUBJ and a patient:DO. An example of a fairly typical member of this group is *nɔkɔm çɐk* 'to fail' (lit., 'to unsuccessful make') in (470). In this example, the order of the PV and LV is inverted (cf. §6.2 for further discussion); however, this does not change the meaning of the LVC. The grammatical relation (direct object) of the pronoun *tɐw=i* '2SG=ACC' is clearly signaled by the use of the ACC case marker. Although the entire clause literally translates as 'he will make you unsuccessful', the LVC *nɔkɔm çɐk* 'to make unsuccessful' is regularly used of a teacher 'failing' a student, as this example illustrates.

(470) *wuz* *çɨ* *tɐt=ər* *çɐn-əm,*
1SG.NOM self.GEN father=DAT say-1SG

NP_{SUBJ} NP_{DO}
[*ɐw*] [*tɐw=i*] ***gɔç-t*** ***nɔ-kɔm.***
3SG.DIST 2SG=ACC make-3SG PRIV-successful
'I will tell my father, and he'll fail you!' (lit., 'make you unsuccessful') (05.44)

One particularly interesting member of this group is the LVC *pɐxpɐx çɐk*, which literally translates as 'flat-flat make'.[98] As shown in (471), this LVC is reflexive; i.e., the object *çɐt* 'self' is coreferential with the subject *tu* '2SG.NOM'. Although one might be tempted to translate *pɐxpɐx çɐk* as 'to flatten', a more accurate translation is 'to creep' because it is used to describe the manner in which a hunter stealthily moves on his hands and knees or on his belly while stalking prey. This LVC is thus an excellent example of the non-compositional meaning characteristic of many LVCs cross-linguistically (cf. Butt 2010: 21); it is also an example of a transitive structure used to express a semantically inchoative predicate (i.e., Agent=Theme).[99]

(471) NP_{SUBJ} NP_{DO}
çɐt-i [*tu*] [*çɐt*] ***pɐxpɐx gɔç*** *sk=əm wɔd rʊʧ͡ʂ, əm d͡zi.*
say-PST 2SG.NOM self flat.flat make.2SG on=PROX canal go.2SG PROX way
'He said, "Creep [lit., 'flatten yourself'] and go along the irrigation canal, like this.'
(TEX-0249.34)

The second group of LVCs in the CAUSE STATE cluster takes an agent:SUBJ and a theme:DO. An example from this group is *mɐrum çɐk* 'to expel' (lit., 'to excluded make'), as seen in (472).

[98] In Afghan Wakhi, reduplication of adjectives has an intensifying function just as it does in other Iranian languages (cf. Ghaniabadi, Ghomeshi & Sadat-Tehrani 2006).

[99] For its synchronic meaning 'to creep', the LVC *pɐxpɐx çɐk* is intransitive. However, I include it with other transitive predicates because I reconstruct it as etymologically transitive based on its reflexive structure.

(472) NP_{SUBJ} NP_{DO}
∅ ***mɐrum*** [*tɐw*] ***gɔç-t***.
∅ expelled 2SG make-3SG
'He will expel you [from school].' (lit., 'He will excluded make you.') (05.47)

The third and final group in this cluster currently contains one LVC: *t͡ʃɐl çɐk* 'to muddy' (lit., 'to muddy make') in (473). I analyze this LVC as having a location:DO instead of a Patient or Theme (like Groups 1 and 2), because the argument coded as direct object is the point of contact for the event expressed by the LVC.

(473) NP_{SUBJ} NP_{DO}
[*jɐ jupk*] [*mɐz̪*] *kɨ* ***t͡ʃɐl*** ***gɔç-ti***.
DIST water 1SG all muddy make-PST
'That water muddied me [lit., 'muddy made me'] all over.' (16.13)

In this section I have described the LV *çɐk* 'to make', which has two clusters of productivity connected to its 'to do' meaning. Having described both the 'to do' and 'to make' LVs, in the next section I turn my attention to the 'to give' verb.

6.4.3 *Rədɔwən* 'to give'

The third of the five most common Afghan Wakhi LVs in my corpus is the verb *rədɔwən*, which means 'to give'.[100] In its heavy verb function, *rədɔwən* is a classic three-place (ditransitive) predicate: it takes a Nominative agent:SUBJ,[101] a Default or Accusative theme:DO,[102] and a Dative recipient:IO. An example of *rədɔwən* in its semantically heavy verb function, with all three of its arguments explicitly expressed, can be seen in (474).

[100] The verb *rədɔwən* 'to give' has *rɐnd* as its present stem and *rʊt* as its past and perfect stem.

[101] The verb *rədɔwən* 'to give' (like all other verbs in Afghan Wakhi) can take a Default subject if that subject is a nominal NP or 3rd person pronoun.

[102] Recall from §3.1.3.10 that Afghan Wakhi exhibits differential object marking (DOM). The NP functioning as a direct object may be in either the the Direct or Accusative case.

(474) NP_{SUBJ} NP_{IO} NP_{DO}
[*wuz*] *ɐn* [*tɐr*] [*ʐɐw*] ***rɐnd-əm,***
1SG.NOM then 2SG.DAT grain give-1SG

tu *mɐrək* *sɔd͡ʒiq* *wuzum.*
2SG.NOM 1SG.DAT gum bring.2SG
'Then I'll give you some grain, (and) you bring me some chewing gum.' (05.16)

As attested by the 32 types of LVCs in my current corpus that are formed with *rədɔwən*, this verb also functions as a light verb. These 32 types are currently divided into three clusters of productivity based on syntactic structure, although two of them can be divided more finely based on argument structure. A semantic map of *rədɔwən* can be seen in Figure 6.3, and a list of the LVCs that this map represents can be found in Appendix E.

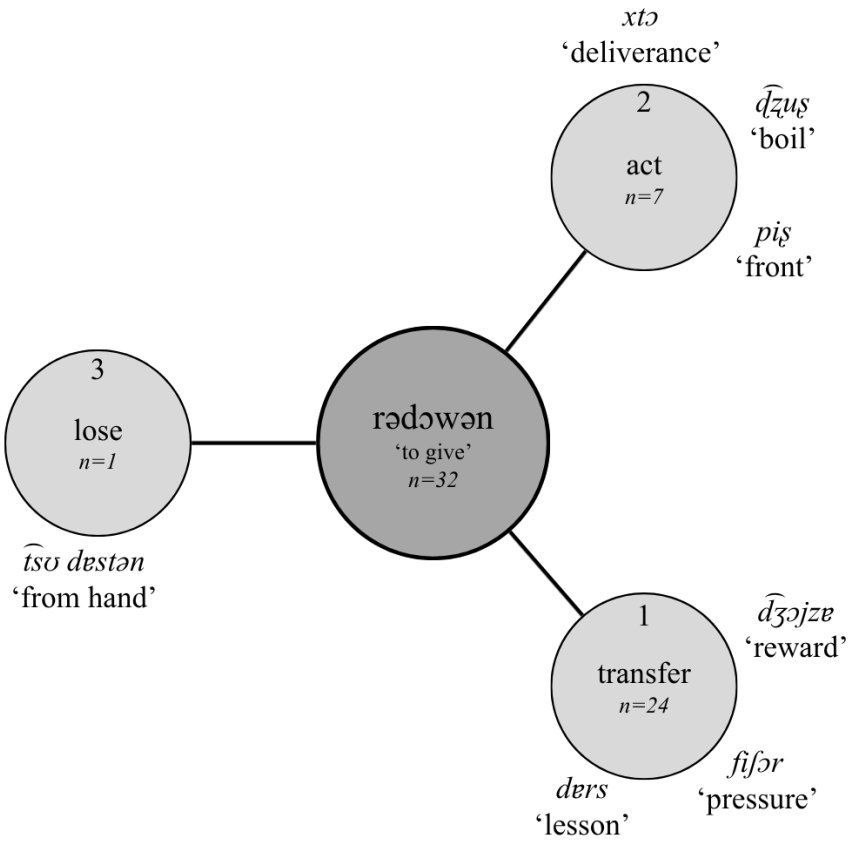


Figure 6.3. Semantic map for *rədɔwən* 'to give'

Some of the three clusters of productivity for the LV *rədɔwən* ‘to give’ include two-place predicates in addition to the three-place predicates one might expect of LVCs formed from a ditransitive verb. The *rədɔwən* clusters thus clearly illustrate another common characteristic of LVCs: the argument structure of an LVC is not simply inherited from the LV, but rather is a product of the unique PV+LV collocation (cf. Butt 2010: 5; Family 2014: 5).

6.4.3.1 Transfer

The cluster of LVCs most closely related to the lexical meaning of *rədɔwən* is the TRANSFER cluster. In terms of *Aktionsart*, the 24 LVCs in this cluster may be Activity, Accomplishment, or Achievement predicates. These constructional specifications are displayed in Table 6.17. This cluster has six subgroups based on argument structure, as seen in Table 6.18.

Table 6.17. *rədɔwən*: TRANSFER construction

PV:	NP
Aktionsart:	Activity, Accomplishment, Achievement

Table 6.18. Sample *rədɔwən*: TRANSFER LVCs

	LVC	Gloss	Meaning	Argument Structure		
	ɐzɔb rədɔwən	torment give	'to torment'	<agt,	pat>	
1	*fiʃɔr rədɔwən*	pressure give	'to pressure, squeeze'	|	|	
	trining rədɔwən	training give	'to train'	SUBJ	DO	
	dəhɔ rədɔwən	prayer give	'to bless'	<agt,	rec>	
2	*d͡ʒɔjzɐ rədɔwən*	reward give	'to reward'	|	|	
	rɔj rədɔwən	vote give	'to vote'	SUBJ	IO	
	niʂɔn rədɔwən	show give	'to show'	<agt,	th,	rec>
3	*dɐrs rədɔwən*	lesson give	'to teach'	|	|	|
				SUBJ	DO	IO
				<agt,	th,	rec>
4	*pɔr rədɔwən*	money give	'to sell'	|	|	|
				SUBJ	OBJ1	OBJ2
				<agt,	rec,	sit>
5	*d͡ʒɐwɔb rədɔwən*	answer give	'to answer'	|	|	|
				SUBJ	IO	(CC_{DO})
				<agt,	loc,	sit>
6	*ʃɔdɐt rədɔwən*	witness give	'to bear witness'	|	|	|
				SUBJ	NP_{POSS}	(CC_{DO})

Group 1 of the TRANSFER cluster contains basic transitive LVCs with an agent:SUBJ and patient:DO, as seen in (475).

(475) *jɐn rʊʂt,*
then go.3SG

NP_{SUBJ} NP_{DO}
pɐs ∅ [*əm kɐʂ*] *jiw=i dəjɐr bʊ drɐ* ***trining rənd.***
after ∅ PROX boy one=EZ another also at.DIST training give.3SG
'Then she [the chukar partridge] goes, (and) afterward she trains this boy there once again.' (25.352)

The second group in this cluster includes LVCs that take an agent:SUBJ and a recipient:IO (but no argument that maps to direct object). The meaning of these LVCs ranges from

compositional (476) to non-compositional (477). Some of the PVs used in this cluster, such as *dəhɔ* ‘prayer’, also collocate with other LVs to create LVCs with other meanings (478). For this reason, I do not analyze the PV as the syntactic direct object in these constructions. Instead, I analyze these LVCs as being on the incipient end of the spectrum.

(476) NP_{SUBJ} NP_{IO}
∅ [*ji xɐlg=ər*] ***rɔj rɐnd-ən,***
∅ one person=DAT vote give-1PL

wɐ jɐ xɐlg wɔst rɐis=i ʃurɔ=i wʊliswɔl-i.
and DIST person become.3SG chief=EZ council=EZ district-ADJ
‘We vote for a person [lit., ‘vote give for a person’], and that person becomes the district council chief.’ (TEX-0306-2.08)

(477) NP_{SUBJ} NP_{IO}
[*ɐw*] [*mɐr*] ***dəhɔ rɐnd.***
3SG.DIST 1SG.DAT prayer give.3SG
‘He will bless me.’ (lit., ‘He will prayer give for me.’) (25.039)

(478) NP_{SUBJ}
∅ ***dəhɔ=əv kər-ti.***
∅ prayer=3PL do-PST
‘They prayed.’ (lit., ‘They prayer did.’) (TEX-003.057)

The TRANSFER cluster’s third group comprises LVCs that are fully ditransitive, with the three arguments agent:SUBJ, theme:DO, and recipient:IO. Two LVCs that use a ditransitive construction are *siminɔr rədɔwən* ‘to teach’ (lit., ‘to seminar give’) in (479) and *niʂɔn rədɔwən* ‘to show’ (lit., ‘to show give’) in (480).

(479) NP_{SUBJ} NP_{DO} NP_{IO}
∅ *jəm d͡zi gɔ=v=i* [*kɨ*] [*əm=ər*] ***siminɔr rɐnd.***
∅ PROX way do=PL.OBL=ACC all 3SG.PROX=DAT seminar give.3SG
‘Like this she teaches him everything.’ (25.319)

(480) NP_{SUBJ} NP_{DO} NP_{IO}
[*tu*] *bɔz* [*t͡ʃigɐsʊk=i tilɔ-i*] [*mɐr*] ***niʂɔn rɐnd.***
2SG.NOM then shelf=EZ gold-ADJ 1SG.DAT show give.2SG
‘Then you will show me the golden shelf.’ (25.231)

Group 4 in the TRANSFER cluster currently contains a single LVC: *pʊr rədɔwən* ‘to sell’ (lit., ‘to money give’). This LVC is unique in that it takes a double-object construction. Recall from §1.6.2 that a double-object construction is one in which both non-Agent arguments of a ditransitive clause are coded identically to a direct object in a transitive clause (i.e., Nominative or Accusative for nominal NPs; Default or Accusative for SAP pronouns). As seen in (481), the LVC *pʊr rədɔwən* ‘to sell’ takes an agent:SUBJ, theme:T-OBJ, and recipient:R-OBJ.

(481) NP_{SUBJ} $NP_{R\text{-}OBJ}$ $NP_{T\text{-}OBJ}$
[*jɐw*] [*mɐz̪*] [*ʊt sɨwdɔ*] ***pʊr*** ***rʊt-i***.[103]
3SG.DIST 1SG MED goods money give-PST
‘He sold me those goods.’

The fifth and sixth groups in this cluster both represent utterance predicates; however, each group takes a slightly different argument structure. The LVC in Group 5, *d͡ʒɐwɔb rədɔwən* ‘to answer’ (lit., ‘to answer give’), has an agent:SUBJ, recipient:IO, and situation:DO, where the situation:DO is a complement clause that expresses the content of the utterance (482).

(482) NP_{SUBJ} NP_{IO}
[*dukɔn-dɔr*] [*mɐr*] ***d͡ʒɐwɔb rʊt-i***
shop-NMLZ 1SG.DAT answer give-PST

CC_{DO}
[*ki sib nɐs̪t*].
COMP apple COP.NEG
‘The shopkeeper answered me [lit., ‘answer gave to me’] that there are no apples.’
(L2 knowledge)

Group 6 also contains one LVC: *ʃɔdɐt rədɔwən* ‘to bear witness’ (lit. ‘to witness give’). Like the LVC in the previous group, this LVC takes an agent:SUBJ and a situation:DO that codes

[103] Based on phonological changes to both the PV and LV, the LVC *pʊr rədɔwən* ‘to sell’ (lit., ‘money give’) appears to be in the process of univerbation. For example, the noun meaning ‘money’ is pronounced as *pʊl*, but in this LVC, the coda of the PV assimilates to the onset of the LV. In addition, the vowels in both the PV and the LV undergo *ʊ~ɔ* ablaut between nonpast and past forms, as is found in some other verbs (e.g., *wʊzʊm* ‘bring.2SG’, *wɔzɔm-di* ‘bring-PST’), even though the past form of *rədɔwən* is usually *rʊti* (no ablaut).

the content of the utterance as a complement clause. However, as (483) illustrates, *ʃɔdɐt rədɔwən* takes not a recipient:IO, but an adnominal possessor (NP_{POSS}) embedded inside an oblique Location. Furthermore, the person against whom the witness speaks is coded not as the object of the preposition *skɐ* 'on', but as the adnominal possessor (*ti* '2SG.GEN') of the prepositional object.

(483) NP_{SUBJ} [NP_{POSS}]
[*jɐw*] *skɐ* [*ti*] *ruj* ***ʃɔdɐt*** ***rɐnd*** = *i*
3SG.DIST on 2SG.GEN face witness give.3SG=SPEC

CC_{DO}
[*ki* *jəm* = *əˌs* *dɐrs* *nʊ* = *d͡ʒɔj-d*].
COMP 3SG.DIST=IPFV lesson NEG=read-3SG
'He will witness against you [lit., 'witness give on your face'] that "he doesn't study."' (01.20)

6.4.3.2 Act

The LVCs in the second cluster of productivity for *rədɔwən* 'to give' express situations that can be described as types of actions; therefore, I call this cluster the ACT cluster. There are seven LVCs in this cluster, most of which are Achievement predicates. However, this cluster does include a few Activity predicates as well. The specifications for this cluster are given in Table 6.19. Although all of the LVCs in this cluster are transitive, they form three groups based on argument structure, as shown in Table 6.20.

Table 6.19. *rədɔwən*: ACT construction

PV:	NP
Aktionsart:	Achievement, Activity

Table 6.20. Sample *rədɔwən*: ACT LVCs

	LVC	Gloss	Meaning	Argument Structure	
1	*ɐnd͡ʒɔm rədɔwən* *ɔzɔr rədɔwən* *d͡ʐuʂ rədɔwən* *qɐrɔr rədɔwən*	accomplishment give harassment give boiling give appointment give	‘to accomplish’ ‘to harass’ ‘to boil’ ‘to appoint’	<agt, | SUBJ	pat> | DO
2	*nid͡ʒɔt rədɔwən* *xtɔ rədɔwən*	rescue give deliverance give	‘to rescue’ ‘to deliver’	<agt, | SUBJ	th> | DO
3	*piʂ rədɔwən*	forward give	‘to chase’	<agt, | SUBJ	gl> | DO

Group 1 of the ACT cluster is composed of LVCs that take an agent:SUBJ and a patient:DO. One LVC typical of this group is the Activity predicate *ɔzɔr rədɔwən* ‘to harass’ (lit., ‘to harassment give’) in (484). Another member of this group, the LVC *qɐrɔr rədɔwən* ‘to appoint’ (lit., ‘to appointment give’), is an example of a class of predicates that are three-place predicates, but the third NP is a nonverbal secondary predicate (NP_{PRED2})[104] rather than an indirect object (cf. Aarts 1995: 76–80; Groot 2017a: 36). Sentence (485) gives an example of *qɐrɔr rədɔwən* in a secondary predicate construction.

(484) NP_{SUBJ} NP_{DO}
∅ [*ɐw=i*] *xub* ***ɔzɔr*** ***rɐnd***.
∅ 3SG.DIST=ACC good harassment give.2SG
‘Harass it well.’ (25.371)

[104] See §1.6.2 for a discussion and examples of secondary predicate constructions in Afghan Wakhi.

(485) *mɐsɐlɐn ji diɔr=i ki də bʊjn t͡suj,*
for.example one village=SPEC COMP LOC middle COP.FACT

NP_{SUBJ}	NP_{DO}	NP_{PRED2}		
∅	[*jɐw=i*]	[*mɐrkɐz*]	***qɐrɔr***	***rɐnd-ən.***
∅	3SG.DIST=ACC	capital	appointment	give-3PL

'For example, a village that is in the middle, (we) appoint it [to be] the capital.'
(lit., 'We appointment give it capital.') (TEX-0306-1.09)

The second group in this cluster represents LVCs that have an agent:SUBJ and theme:DO. The LVC *nid͡ʒɔt rədɔwən* 'to rescue' (lit., 'to rescue give') in (486) is an example of an Achievement predicate from this group. Although the direct object of *nid͡ʒɔt rədɔwən* could potentially be seen as a Patient argument affected by the act of deliverance, I analyze it as a Theme that changes location metaphorically and / or literally when it is freed from its oppressors.

(486) *tu rʊt͡ʂ jɐw=i,*
2SG.NOM go.2SG 3SG.DIST=ACC

NP_{SUBJ}		NP_{DO}		
∅	*t͡sʊ ʃəɣɔl=ən*	[*ɐw=i*]	***nid͡ʒɔt***	***rɐnd,*** *ɐw=i.*
∅	from jackal=ABL	3SG.DIST=ACC	rescue	give.2SG 3SG.DIST=ACC

'Go to him and deliver him [lit., 'rescue give him'] from the jackals, that (man).' (25.246)

The third and final group of the ACT cluster currently includes a single LVC: *piʂ rədɔwən* 'to chase' (lit., 'forward give'). The argument structure of this LVC includes an agent:SUBJ and a goal:DO that is the "moving destination" the Agent seeks to attain. As seen in (487), *piʂ rədɔwən* is an Activity predicate.

(487)

NP_{SUBJ}			NP_{DO}		
∅	*də ji*	*d͡ʒɐj*	[*d͡ʒɔndɔr=i*]	***piʂ***	***rɐnd,***
∅	LOC one	place	MP.sheep=ACC	forward	give.2SG

rə ʂɐx rəwʊz.
down.to cliff leap.2SG
'In one place you are chasing a Marco Polo sheep [lit., 'forward giving a Marco Polo sheep'], and you leap down a cliff.' (25.521)

6.4.3.3 Lose

I currently have one LVC that does not fit into either of the other two clusters for *rədɔwən*. This LVC has a prepositional phrase as its PV: *t͡sʊ dɛst=ən* 'from hand=ABL'. When this PP is collocated with *rədɔwən*, the resulting LVC means 'to lose', i.e., to non-volitionally give something up to one's own detriment, as seen in (488). This LVC is syntactically transitive, but because of its unique semantics, I analyze its two arguments as being a source:SUBJ and a theme:DO.

(488) NP_{SUBJ} NP_{DO}
[*sɛk*]*=ən* [*dɛftɛr=i*] ***t͡sʊ dɛst=ən rʊt-i.***
1PL.NOM=1PL office=ACC from hand=ABL give-PST
'We lost the office.' (lit., 'We the office from hand gave.')

Since the LVC *t͡sʊ dɛstən rədɔwən* 'to lose' is currently the only *rədɔwən* LVC in my corpus with this kind of meaning, I assign it to a separate cluster called the LOSE cluster. I use the term "cluster" loosely here, mostly for the sake of consistency with my descriptions of other clusters, but partly to suggest the possibility of discovering other similar LVCs in the future.[105] Table 6.21 gives the specifications for this construction. The argument structure for this LVC can be seen in Table 6.22.

Table 6.21. *rədɔwən*: LOSE construction

PV:	PP
Aktionsart:	Achievement

[105] Other LVCs that take a *t͡sʊ* 'from'+ABL PP as their PV share similar malefactive semantics, as I discuss in §6.6.

Table 6.22. *rədɔwən*: LOSE LVC

LVC	Gloss	Meaning	Argument Structure
t͡sʊ dɐstən rədɔwən	from hand give	'to lose'	<src, th> | | SUBJ DO

As I have described in this section, the LV *rədɔwən* has three clusters of productivity. Of these, two clusters (TRANSFER and LOSE) bear similarities to the heavy verb use of *rədɔwən* 'to give' in that they involve semantics of transfer, while the ACT cluster exhibits a somewhat more metaphorical connection to *rədɔwən*'s heavy verb meaning. In contrast, the clusters of productivity associated with the LV *dingɐk* 'to hit' appear to have developed largely through processes of metonymic rather than metaphoric extension. This verb is the subject of the following section.

6.4.4 *Dingɐk* 'to hit'

In Afghan Wakhi, the verb *dingɐk* means 'to hit', as illustrated by (489). This verb also functions as a very productive LV, with 44 types of *dingɐk* LVCs currently attested in my corpus. All of the LVCs in my corpus that are formed with *dingɐk* are listed in Appendix F.

(489) *tu=ʂ* *rɐ* *bʊ* *rʊt͡ʂ,*
2SG.NOM=IPFV down.to also go.2SG

zɐ=v=i=ʂ *rɐ* ***di.***
child=PL.OBL=ACC=IPFV down.to hit.2SG
'You go down there and hit the (other) children.' (01.11)

The LVCs formed with *dingɐk* 'to hit' can be divided into two high-level clusters based on transitivity (transitive vs. intransitive). Many of these clusters are Semelfactive, which is not surprising given that *dingɐk* itself is Semelfactive and thus has the potential for instantaneous, bounded repetition. However, there is a large amount of diversity within both the transitive and

intransitive clusters. I currently recognize four sub-clusters within the transitive group and seven within the intransitive group. These clusters are depicted in Figure 6.4.

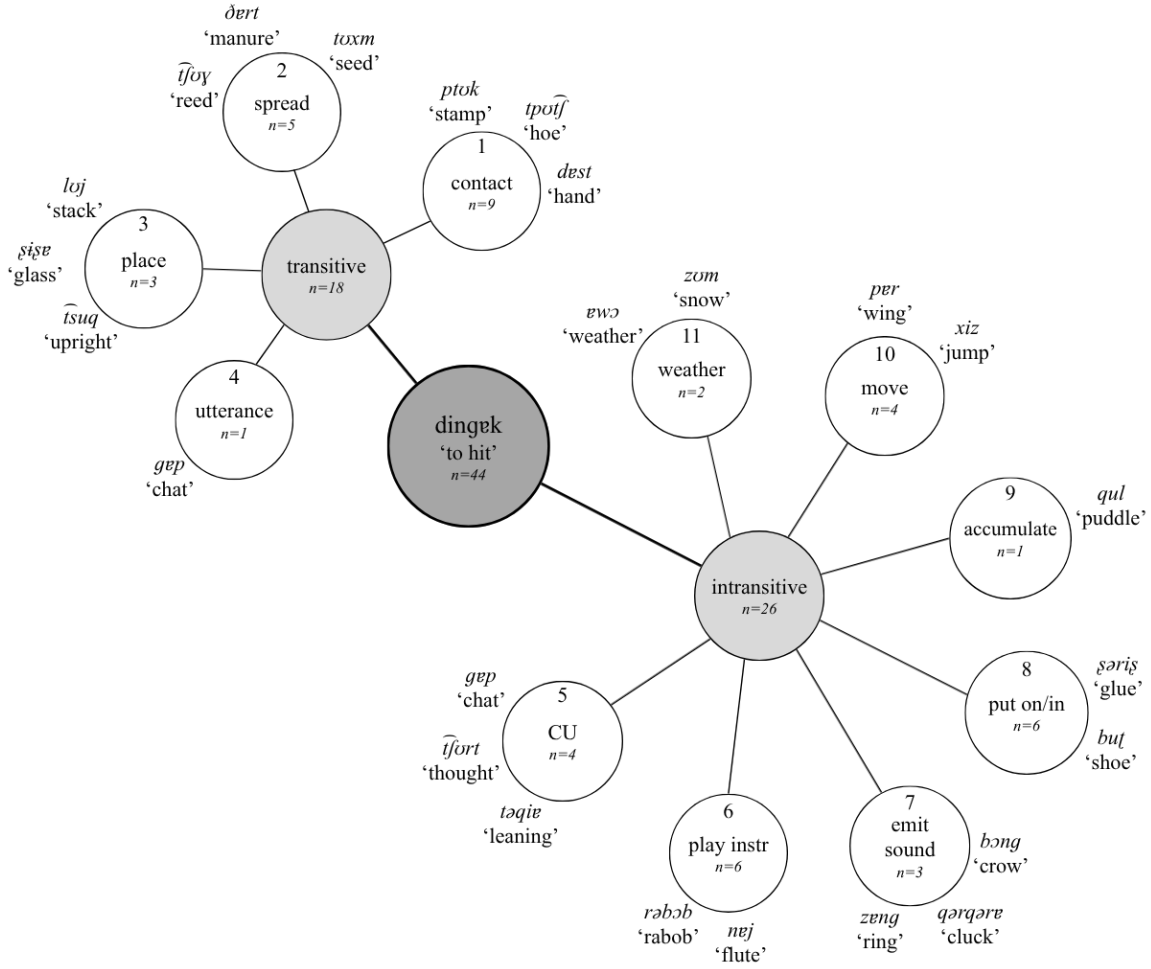


Figure 6.4. Semantic map for *dingɐk* 'to hit'

I found more clusters for *dingɐk* 'to hit' than for the other light verbs in my corpus. Some of these clusters are clearly differentiated by syntax and / or *Aktionsart*; however, others have more semantic bases rooted in properties of the PV. I describe the transitive clusters of *dingɐk* in §6.4.4.1 – §6.4.4.4, followed by the intransitive clusters in §6.4.4.5 – §6.4.4.11.

6.4.4.1 TR: Contact

The first of the transitive clusters for *dingɐk* is the TR: CONTACT cluster, which is so called because all of its LVCs involve some kind of surface contact. The TR: CONTACT cluster is also the one that seems most closely connected to *dingɐk*'s lexical meaning 'to hit'. Most of the nine LVCs in this cluster are Semelfactive predicates, although some may be Activity or Achievement predicates (or may alternate between several *Aktionsart* types) depending on the inherent properties of the PV involved and the situation being described. Table 6.23 displays the features of the TR: CONTACT cluster. All of the LVCs in this cluster are two-place predicates, but they form three groups based on argument structure, as shown in Table 6.24.

Table 6.23. *dingɐk*: TR: CONTACT construction

PV:	NP
Aktionsart:	Semelfactive (primarily)

Table 6.24. Sample *dingɐk*: TR: CONTACT LVCs

	LVC	Gloss	Meaning	Argument Structure	
	ʈɐx dingɐk	shaking hit	'to shake out'	<agt,	th>
1	*tilɐ dingɐk*	push hit	'to push'	|	|
				SUBJ	DO
	dɐst dingɐk	hand hit	'to touch'	<agt,	gl>
2	*ptɔk dingɐk*	stamp hit	'to stamp'	|	|
	tpɔt͡ʃ dingɐk	hoe hit	'to hoe'	SUBJ	DO
				<agt,	gl>
3	*dit͡ʃɔr dingɐk*	opposite hit	'to meet'	|	|
				SUBJ	IO

Group 1 of the TR: CONTACT cluster currently contains two LVCs that take an agent:SUBJ and a theme:DO that changes location but is not affected by the action of the predicate. An example with *ʈɐx dingɐk* 'to shake out' (lit., 'to shaking hit') can be seen in (490).

(490) NP_{SUBJ} NP_{DO}
∅ *wuzm-ən d͡ʒɐm=ən* [*niðung*] ***ʈɐx*** ***di-n***.
∅ bring-1PL gathered=1PL sheaf shaking hit-1PL
'We bring [the millet] and gather (it) and shake out the sheaves [to get the dirt out].'
(lit., 'We . . . shaking hit the sheaves.') (TEX-0088.16)

The second, most populous group in this cluster comprises LVCs that have an agent:SUBJ and a goal:DO. I analyze the direct objects of this cluster as Goal arguments because they represent the destination of a contact event. The LVC *tpʊt͡ʃ dingɐk* 'to hoe' (lit., 'to hoe hit') in (491) exemplifies the Semelfactive *Aktionsart* of this group because hoeing by nature consists of striking the ground with a hoe—an action that is instantaneous and that results in a "reset" to the original state.

(491) *nuzˌdʊn=ən ki jəm kər-ti,*
weed=1PL COMP 3SG.PROX do-PST

NP_{SUBJ} NP_{DO}
wɔz ∅ [*jəm=i*] *pɐs* ***tpʊt͡ʃ di-nən***.
then ∅ 3SG.PROX=ACC after hoe hit-1PL
'When we have weeded it, then afterward we hoe it.' (TEX-0088.12)

Group 3 of the TR: CONTACT cluster also takes an Agent and a Goal, but in this case the Goal maps to a Dative-marked indirect object, as seen in (492). The only LVC currently in this group, *dit͡ʃɔr dingɐk* 'to meet' (lit., 'to opposite hit'), is an Achievement predicate. This LVC communicates the concept of meeting someone face-to-face and is neutral with respect to the volitionality of the Agent.

(492) NP_{SUBJ} NP_{IO}
[*ji sjɔsɐr*] [*mɐr*] ***dɪ́ʧɔr duʃ-ti.***
one young.woman 1SG.DAT opposite hit-PST
'A young woman met me.' (lit., 'A young woman to me opposite hit.') (09.08)

6.4.4.2 TR: Spread

The second transitive cluster for the LV *dingɐk* is the TR: SPREAD cluster, which comprises five transitive LVCs. These LVCs all take an agent:SUBJ that spreads something on a surface until that surface is completely covered. The surface (i.e., the destination of the spreading) is coded as a goal:DO argument, while the entity being spread is expressed by the PV. The inherent properties of the PV and any additional information about the situation (e.g., adverbials of time or qualities of the surface being covered) determine whether a particular LVC in this cluster is an Accomplishment or Activity predicate. The features of the TR: SPREAD construction are given in Table 6.25. The members of this cluster and their argument structure can be seen in Table 6.26.

Table 6.25. *dingɐk*: TR: SPREAD construction

PV:	NP
Aktionsart:	Accomplishment, Activity

Table 6.26. *dingɐk*: TR: SPREAD LVCs

LVC	Gloss	Meaning	Argument Structure	
ðɐrt dingɐk	manure hit	'to spread manure'	<agt,	gl>
puʃ dingɐk	cover hit	'to cover'	|	|
ʂəriʂ dingɐk	glue hit	'to put glue on'	SUBJ	DO
ʃʊt dingɐk	dirt hit	'to cover with dirt'		
tʊxm dingɐk	seed hit	'to sow'		

An example LVC from the TR: SPREAD cluster can be seen in (493) with the LVC *tʊxm dingɐk* 'to sow' (lit., 'to seed hit'). In this example, the goal:DO is the pronoun *jəm=i*

'3SG.PROX=ACC', which refers to the surface (a field) being sown with seed. Including the Goal argument provides limits to the situation, thus making this an Accomplishment predicate; when a Goal is not included, the same LVC functions as an intransitive Activity predicate.

(493) NP_{SUBJ} NP_{DO}
[*sɐk*] [*jəm=i*] ***tʊxm di-nən.***
1PL.NOM 3SG.PROX=ACC seed hit-1PL
'We sow it [the field].' (lit., 'We seed hit it.') (TEX-0088.06)

6.4.4.3 TR: Place

The third transitive cluster for *dingɐk* 'to hit' is the TR: PLACE cluster. The three LVCs in this cluster are all Semelfactive predicates that express different actions of setting an object in place. The PVs in this cluster are NPs that denote the kind of placing being done, while the direct objects code Theme arguments being set in place. The features of the TR: PLACE construction can be seen in Table 6.27; its members and argument structure are given in Table 6.28.

Table 6.27. *dingɐk*: TR: PLACE construction

PV:	NP
Aktionsart:	Semelfactive

Table 6.28. *dingɐk*: TR: PLACE LVCs

LVC	Gloss	Meaning	Argument Structure	
lɔj dingɐk	stack hit	'to stack'	<agt,	th>
ʂiʂɐ dingɐk	glass hit	'to install windows'	|	|
t͡suq dingɐk	upright hit	'to erect'	SUBJ	DO

One example of a TR: PLACE predicate is the LVC *t͡suq dingɐk* 'to erect' (lit., 'to upright hit'). An inverted version of this LVC can be seen in (494) with the direct object *jistin=əv*

'pillar=PL.OBL'.[106] Although in English *t͡suq* translates best as the adjective 'upright', in Afghan Wakhi it is syntactically a noun. The nominal status of *t͡suq* is clearer in (495), where it serves as the object of the preposition *tɐ* 'up to'.

(494) *jəm=v=əm* *ki* *bərd͡ʒɔj* *kər-ti,*
3SG.PROX=PL.OBL=1SG COMP place do-PST

	NP_{SUBJ}	NP_{DO}			
jɐn	∅	[*jəm*	*jistin=əv*]	***di-nən***	***t͡suq****.*
then	∅	PROX	pillar=PL.OBL	hit-1PL	upright

'When we have placed them [the carrying beams], then we erect the pillars.' (TEX-0096.17)

(495)

				P	NP
rə	*xʊʈ*	*wɐʂ-k*	*bit͡ʃkɐm*	[*tɐ*	***t͡suq***].
down.to	dirt.clod	fall-PRS	tail	up.to	upright

'He has fallen on a dirt clod (but his) tail is upright [lit., 'to upright'].' (Wakhi proverb)

6.4.4.4 TR: Utterance

The fourth and final transitive cluster for *dingɐk* 'to hit' is the TR: UTTERANCE cluster. This cluster currently has one member: the LVC *gɐp dingɐk* 'to talk to' (lit., 'to chat hit').[107] This LVC is a two-place Activity predicate that takes an agent:SUBJ and a recipient:IO. Table 6.29 gives the constructional features for this LVC, and Table 6.30 displays its argument structure.

Table 6.29. *dingɐk*: TR: UTTERANCE construction

PV:	NP
Aktionsart:	Activity

[106] Recall from §3.1.2 that *=v* is the plural enclitic used for oblique cases.

[107] The LVC *gɐp dingɐk* may also be used intransitively with the meaning 'to chat', as I show in the next section (§6.4.4.5).

Table 6.30. *dingɐk*: TR: UTTERANCE LVC

LVC	Gloss	Meaning	Argument Structure
gɐp dingɐk	chat hit	'to talk to'	<agt, rec> | | SUBJ IO

The recipient:IO (i.e., the addressee of the speech act) for *gɐp dingɐk* 'to talk to' takes Dative case marking. As seen in (496), the Recipient (*mɐrək* '1SG.DAT') of this LVC is someone who is being spoken to, but who is not engaging in reciprocal conversation.

(496) *tu* *t͡ʃəkɔrɐ* *ʊmi*
2SG.NOM what COP. SBJV.2SG

	NP_{SUBJ}	NP_{IO}				
ki	∅	[*mɐrək*]	*əm*	*d͡ʒi*	***gɐp***	***di****?*
COMP	∅	1SG.DAT	PROX	way	chat	hit.2SG

'What might you be, that you talk to me [lit., 'chat hit to me'] like this?' (25.123)

6.4.4.5 ITR: Cognition & Utterance

The fifth cluster for *dingɐk* 'to hit' is its first intransitive cluster. I call this the ITR: COGNITION & UTTERANCE cluster because it comprises LVCs that express cognition and utterance events. There are four LVCs in this cluster; these LVCs are Activity predicates that take a nominal NP as their PV. The constructional specifications for this cluster can be seen in Table 6.31. The members of this cluster form three groups based on argument structure, which are displayed in Table 6.32.

Table 6.31. *dingɐk*: ITR: COGNITION & UTTERANCE construction

PV:	NP
Aktionsart:	Activity

Table 6.32. *dingɐk*: ITR: COGNITION & UTTERANCE LVCs

	LVC	Gloss	Meaning	Argument Structure	
1	*gɐp dingɐk*	chat hit	'to chat'	<agt,	com>
				|	|
				SUBJ	OBL ['COM']
2	*təkiɐ dingɐk*	lean hit	'to trust'	<agt,	loc>
	t͡ʃʊrt dingɐk	thought hit	'to think'	|	|
				SUBJ	(OBL ['LOC'])
3	*t͡ʃʊrt dingɐk*	thought hit	'to think'	<agt,	sit>
				|	|
				SUBJ	(CC_{DO})

The first group for the ITR: COGNITION & UTTERANCE cluster contains the LVC *gap dingɐk*, lit., 'to chat hit'. As discussed in the previous section (§6.4.4.4), this LVC means 'to talk to' when used transitively. However, when used intransitively, it means 'to chat'. The intransitive argument structure for *gap dingɐk* includes an agent:SUBJ and a comitative:OBL; the Comitative argument is coded as a *də* 'COM'+ABL PP as in (497). In this construction, the Comitative argument is understood as an active participant in the conversation.

(497) S PP
∅ ***gɐp*** [*də tɐw=ən*] ***di-məm.***
∅ chat COM 2SG=ABL hit-1SG
'I will chat with you.' (25.597)

Group 2 of this cluster includes LVCs that take an agent:SUBJ and an optional location:OBL as arguments. Example (498) contains the cognition predicate *t͡ʃʊrt dingɐk* 'to think' (lit., 'to thought hit'). In this example, the content of the subject's thoughts is understood from context (he is considering a marriage proposal for his daughter). The content of the thoughts can optionally be expressed via a Location that is coded as a PP headed by *skɐ* 'on'. Although I do not have any examples documented in my corpus, I have heard such constructions in

conversation with native speakers. Based on my L2 knowledge, I provide an example of a clause with a location:OBL in (499).

(498) NP_{SUBJ}
çɐt-i *xʊj,* [*wuz*] ***t͡ʃʊrt*** ***di-məm.***
say-PST INTJ 1SG.NOM thought hit-1SG
'He said, "Well, I will think (about it)."' (TEX-003.023)

(499) NP_{SUBJ} PP_{OBL}
[*wuz*] [*skɐ çɨ* *fɔmil* *sɐr*] *ziɔt* ***t͡ʃʊrt*** ***dim-əm.***
1SG.NOM on self.GEN family head a.lot thought hit-1SG
'I think a lot about my family.' (L2 knowledge)

The content of cognition for the LVC *t͡ʃʊrt dingɐk* 'to think' (lit., 'to thought hit') can also be expressed as an optional situation:DO that takes the form of a postverbal complement clause. This argument structure is the basis for Group 3 of the ITR: COGNITION AND UTTERANCE cluster. Although my current corpus contains no natural examples of this structure, it is one I have heard many times in conversation with native speakers. Sentence (500) is adapted from a natural example with the LVC *fikr t͡sərɐk* 'to think' (lit., 'to thought do') that uses the same argument structure as *t͡ʃʊrt dingɐk* 'to think'.

(500) NP_{SUBJ}
∅ *jɐn=əm* ***t͡ʃʊrt*** ***dʊʃ-ti***
∅ then=1SG thought hit-PST

CC_{DO}
[*ki* *ji* *dərɐxt* *bɔjɐd* *ʊmʊt*].
COMP one tree must COP.SBJV.3SG
'Then I thought [lit., 'thought hit'] that, "There must be a tree."'

6.4.4.6 ITR: Play Instrument

The sixth cluster for *dingɐk* 'to hit' is the ITR: PLAY INSTRUMENT cluster. This cluster currently comprises six LVCs formed with *dingɐk* that are used to express the playing of an instrument. The PV for these LVCs is a nominal NP that denotes the instrument being played.

These LVCs may be either Activity or Semelfactive predicates depending on the inherent qualities of the PV, such as the type of instrument being played and the manner in which it is played. The constructional specifications for the ITR: PLAY INSTRUMENT cluster can be seen in Table 6.33. All of the LVCs in this cluster are intransitive and take a single agent:SUBJ argument, as shown in Table 6.34.

Table 6.33. *dingɐk*: ITR: PLAY INSTRUMENT construction

PV:	NP
Aktionsart:	Activity, Semelfactive

Table 6.34. *dingɐk*: ITR: PLAY INSTRUMENT LVCs

LVC	Gloss	Meaning	Argument Structure
ɐrmuniɐ dingɐk	harmonium hit	'to play the harmonium'	<agt>
dɐmburɐ dingɐk	lute hit	'to play the lute'	|
dɔriɐ dingɐk	frame drum hit	'to play the frame drum'	SUBJ
kɔsiu dingɐk	keyboard hit	'to play the keyboard'	
nɐj dingɐk	flute hit	'to play the flute'	
rəbɔb dingɐk	*rabab* hit	'to play the *rabab*'	

The LVC *rəbɔb dingɐk* 'to play the *rabab*' (lit., 'to *rabab* hit') in (501) is an example of a typical predicate from the ITR: PLAY INSTRUMENT cluster. The *rabab* is a traditional stringed lute-like instrument that is plucked, not strummed.

(501) NP_{SUBJ}
[*kuj ki qɨsɔjid çən-ɐk-kɨzg ʊmʊt*],
who COMP mourning.song say-INF-AGT COP.SBJV.3SG

rəbɔb dʊʃt, *qɨsɔjid çɐn-d.*
rabab hit.3SG mourning.song say-3SG
'Anyone who is a mourning-song-singer plays the *rabab* [lit., 'rabab-hits'] and sings mourning songs.' (Solar and Lunar Eclipses 06)

The ITR: PLAY INSTRUMENT cluster of LVCs clearly began as regular transitive clauses in which the direct object was a musical instrument played by hitting (e.g., drum, lute, *rabab*). However, this literal use of *dingɐk* has been extended over time to include instruments that are not played via strong, percussive contact (e.g., flute, harmonium, electronic keyboard). These non-literal PV+LV collocations lead me to analyze the entire cluster as having crossed into the spectrum of LVCs (albeit not very far). An example of a non-literal LVC from this cluster, *nɐj dingɐk* 'to play the flute', can be seen in (502). Since playing a flute is inherently unbounded, this example illustrates an Activity predicate from this cluster.

(502) NP_{SUBJ}
[*ʃɐrɔn*] *ɣɐ xʊʃruj* ***nɐj dʊʃt.***
poet.PL INTS beautiful flute hit.3SG
'Poets play the flute very beautifully.'

6.4.4.7 ITR: Emit Sound

Cluster 7 for *dingɐk* is the ITR: EMIT SOUND cluster. The members of this cluster express internally instigated production of sound. The PV is a nominal NP that codes the kind of sound being produced. ITR: EMIT SOUND LVCs do not denote sustained sounds, but rather repetitive ones; thus, this cluster comprises Semelfactive predicates. Table 6.35 gives the features characteristic of this construction. I currently have three LVCs in my corpus that belong to this cluster, all of which are displayed in Table 6.36 along with their shared argument structure.

Table 6.35. *dingɐk*: ITR: EMIT SOUND construction

PV:	NP
Aktionsart:	Semelfactive

Table 6.36. *dingɐk*: ITR: EMIT SOUND LVCs

LVC	Gloss	Meaning	Argument Structure
bɔng dingɐk	crow hit	'to crow'	<agt>
qərqərɐ dingɐk	cluck hit	'to cluck'	|
zɐng dingɐk	bell hit	'to ring'	SUBJ

The LVC *qərqərɐ dingɐk* 'to cluck' (lit., 'to cluck hit') in (503) is an example of a typical predicate from the ITR: EMIT SOUND cluster. As seen in this example, most of these constructions are used of animal sounds. Although one can conceivably hit a bell and cause it to ring (cf. *zɐng dingɐk* 'to ring'),[108] one does not literally "hit" a crow or a cluck. Therefore, this cluster is a good example of LVCs that fall somewhere on the middle of the spectrum between incipient LVCs (like the ITR: PLAY INSTRUMENT cluster, §6.4.4.6) and clear LVCs (like the TR: SPREAD CLUSTER, §6.4.4.2).

(503) NP_{SUBJ}
[*t͡ʃkir*] ***qərqərɐ dʊʃt***.
partridge cluck hit.3SG
'Partridges cluck.'

6.4.4.8 ITR: Put On / In

The cluster ITR: PUT ON / IN is the eighth cluster of LVCs formed with *dingɐk.* The six LVCs in this cluster all have to do with setting or installing some entity into place. Although semantically similar to the TR: PLACE cluster, this cluster is intransitive. The ITR: PUT ON / IN cluster takes a nominal NP as PV; this PV expresses the type of entity being installed or set in place. These LVCs may be Achievement predicates when used to refer to the installation or placement of a single item, but they more commonly function as Semelfactive predicates that

[108] One member of this cluster, the LVC *zɐng dingɐk* 'bell hit' (i.e., 'to ring'), is used of a telephone ringing. Although I have heard this LVC many times in conversation, I do not have any natural examples recorded in my corpus.

encompass a series of repeated actions.[109] The properties of the ITR: PUT ON / IN cluster are outlined in Table 6.37. There are two argument structure constructions associated with this cluster; these constructions and the LVCs that use them can be seen in Table 6.38.

Table 6.37. *dingɐk*: ITR: PUT ON / IN construction

PV:	NP
Aspect:	Achievement, Semelfactive

Table 6.38. *dingɐk*: ITR: PUT ON / IN LVCs

	LVC	Gloss	Meaning	Argument Structure
1	*buqrɐ dingɐk* *buʈ dingɐk* *diwɔl dingɐk* *kɔlɐ dingɐk*	burqa hit shoe hit wall hit hat hit	'to put on a burqa' 'to put on shoes' 'to build a wall' 'to put on a hat'	<agt> | SUBJ
2	*t͡ʃʊɣ dingɐk* *turit͡ʃ dingɐk*	reed hit peeled stick hit	'to lay reeds' 'to lay peeled sticks'	<agt, gl> | | SUBJ OBL ['on']

Group 1 of the ITR: PUT ON / IN cluster includes intransitive LVCs that take a sole agent:SUBJ argument. The LVC *diwɔl dingɐk* 'to build walls' (lit., 'to wall hit') in (504) is a prototypical example from this cluster. This predicate expresses the action of building walls; specifically, it denotes the process of building up the wall structure by stacking stones. In the cultural context of the Afghan Wakhi people, wall-building involves a series of discrete, instantaneous actions. Therefore, I analyze this (and the other members of this group) as Semelfactive predicates.

[109] The possibility of activity-like repetition leads Croft (2012: 40) to use the term "cyclic achievement" rather than "Semelfactive" for this *Aktionsart* type.

(504) *jɐrk=əʂ* *t͡sɐr-ən,*
work=IPFV do-3PL

NP$_{SUBJ}$
∅ ***diwɔl=əʂ*** ***di-nən,*** *də* *ji* *d͡ʒɐj.*
∅ wall=IPFV hit-3PL LOC one place
'They're working, they're building walls [lit., 'wall-hitting'], in a certain place.' (25.542)

Group 2 LVCs in this cluster have an agent:SUBJ and a goal:OBL that is coded via a *skɐ* 'on' PP. The Goal argument expresses the surface (i.e., the semantic destination) being covered by the action of the LVC. Sentence (505) gives an example from this group, the LVC *turit͡ʃ dingɐk* 'to lay peeled sticks' (lit., 'to peeled-stick-hit'). The Goal argument in this clause is the PP *sk=əm* 'on=3SG.PROX'. This LVC is an Accomplishment predicate thanks to the boundedness of the surface being covered (the ceiling of a house).

(505) *jəm* *dʊstʊk=v=ən* *ki* *kɨ* *kɐr-ti,*
PROX ceiling.beam=PL.OBL=1PL COMP all do-PST

NP$_{SUBJ}$ PP$_{OBL}$
bɐd=i *jəm* *jɐn* *wɔz* ∅ [*sk=əm*] ***turit͡ʃ*** ***di-nən.***
after=EZ PROX then then ∅ on=3SG.PROX peeled.stick hit-1PL
'When we have put in all the ceiling beams, after this then we lay peeled sticks [lit., 'peeled-stick-lay'] on them.' (TEX-0096.20)

6.4.4.9 ITR: Accumulate

The ninth cluster for *dingɐk* is the ITR: ACCUMULATE cluster. This cluster currently contains only one LVC: *qul dingɐk* 'to puddle' (lit., 'to puddle-hit'), seen in (506). This LVC is an Accomplishment predicate that takes a nominal NP as its PV; it also has a single agent:SUBJ argument according to the "non-sentient" (natural force) sense of Agent given in §1.6.1. The constructional specifications for this LVC are given in Table 6.39, and its argument structure can be seen in Table 6.40.

(506) *də ji d͡ʒɐj=əm rəwɻ-di*
LOC one place=1SG go-PST

ki bɔriʃ ɣɐ ziɔt rʊç-k,
COMP rain INTS a.lot go-PRS

NP$_{SUBJ}$
[*jupk*] *dr=ɐ* ***qul*** ***di-ʊt-k****.*
water at=DIST puddle hit-PRF-PRS
'I went to a place where it had rained a lot, (and) the water had puddled [lit., 'had puddle-hit'] there.' (15.07)

Table 6.39. *dingɐk*: ITR: ACCUMULATE construction

PV:	NP
Aktionsart:	Accomplishment

Table 6.40. *dingɐk*: ITR: ACCUMULATE LVC

LVC	Gloss	Meaning	Argument Structure
qul dingɐk	puddle hit	'to puddle'	<agt> | SUBJ

6.4.4.10 ITR: Move

The ITR: MOVE cluster is the tenth cluster of *dingɐk* 'to hit'. This cluster comprises four LVCs; for this cluster, the nominal NP that functions as the PV encodes information about the manner or type of motion being expressed. The LVCs in this cluster may be Semelfactive, Activity, or Achievement predicates based upon the inherent properties of the PV; thus, *Aktionsart* is not part of the unique constructional meaning associated with this cluster. Table 6.41 displays the key features of this construction. As Table 6.42 shows, all of these LVCs take a single agent:SUBJ argument.

Table 6.41. *dingɐk*: ITR: MOVE construction

PV:	NP
Aktionsart:	Depends on PV

Table 6.42. *dingɐk*: ITR: MOVE LVCs

LVC	Gloss	Meaning	Argument Structure
pɐr dingɐk	wing hit	'to fly'	<agt>
ʂɐpɐs dingɐk	haste hit	'to hurry'	|
təkiɐ dingɐk	lean hit	'to lean'	SUBJ
xiz dingɐk	jump hit	'to jump'	

The LVC *pɐr dingɐk* 'to fly' (lit., 'to wing hit') in (507) is an example of an Activity predicate from this cluster because it refers to the general action of flying, not the individual beats of a bird's wings. In contrast, *xiz dingɐk* 'to jump' (lit., 'to jump hit') in (508) is an example of an LVC that can be either an Achievement or a Semelfactive predicate because a person can jump once or repeatedly.

(507) NP_{SUBJ}
[*pərindɐ*] *t=əm* ***pɐr*** ***nʊ=dʊʃ-t***.
bird to=PROX wing NEG=hit-3SG
'Birds don't fly [lit., 'don't wing hit'] here.' (25.168)

(508) *mɐr* *xʊʃ* *rʊt-i*
1SG.DAT happy give-PST

NP_{SUBJ}
ki [*wuz*] *ɐ=d=əm* *jupk* ***xiz*** ***di-məm***.
COMP 1SG.NOM EMPH=LOC=PROX water jump hit-1SG
'It made me happy that I (should) jump in the water.' (15.08)

6.4.4.11 ITR: Weather

The eleventh and final cluster for *dingɐk* is the ITR: WEATHER cluster, which has two members: *ɐwɔ dingɐk* 'to precipitate heavily' (lit., 'to weather hit') and *zʊm dingɐk* 'to snow heavily' (lit., 'to snow hit'). An example with *zʊm dingɐk* 'to snow heavily' can be seen in (509).

(509) ***zʊm*** ***dʊʃt*** *jɔ* *ji* *t͡ʃiz*
snow hit.3SG or one thing

bʊt *tər* *ʊt͡ʃ* *nɐng* *nʊ=bɐs* *wizit.*
also over.to none direction NEG=enough come.3SG
'It snows or something and (a person) can't go anywhere.' (TEX-0098.09)

The LVC *zʊm dingɐk* 'to snow' always takes the 3SG form of the LV (*dʊʃt* 'hit.3SG'), as in (509). However, is not a typical intransitive predicate. Testing with native speakers shows that this LVC cannot be causativized (e.g., *'God made it snow yesterday'), nor can the NP that expresses the specific weather event be made specific (e.g., *'That snow yesterday really came down'). Based on these native speaker judgments, I conclude that *zʊm* 'snow' is the PV of this Activity predicate, not the subject of the verb. [110]

A predicate that lacks any real arguments may be called AVALENT or ZERO-INTRANSITIVE (Dryer 2007: 267; Velupillai 2012: 258). Cross-linguistically, avalent predicates are commonly used to express weather and other environmental conditions. Dryer (2007: 267ff) lists four common strategies for coding avalent predicates, including the non-referential use of a 3SG verb form, such as that seen in (509). Given these facts, I analyze the LVC *zʊm dingɐk* 'to snow', as well as other weather LVCs with the same properties, as avalent predicates.[111] The features of

[110] The LVC *zʊm dingɐk* 'to snow' is not unique in this respect. Other weather predicates also lack a subject, e.g., *bɔrɪʃ wʊdərɐk* 'to rain' (lit., 'to rain hold').

[111] For a comparison of weather predicates in Afghan Wakhi, see §6.6.

the ITR: WEATHER construction can be seen in Table 6.43; the null symbol indicates the lack of arguments.

Table 6.43. *dingɐk*: ITR: WEATHER construction

Structure:	∅ LVC
PV:	NP
Aktionsart:	Activity

With eleven clusters of productivity identified thus far, the LV *dingɐk* 'to hit' has a more diverse range of uses than any of the other LVs discussed in this chapter. Many of these uses share similar semantics of eventive surface contact and / or iteration. Having described these clusters, I now move on to the last of the five highly productive LVs discussed in this chapter: the verb *wɔt͡sɐk* 'to become'.

6.4.5 *Wɔt͡sɐk* 'to become'

The lexical verb *wɔt͡sɐk* means 'to become' in Afghan Wakhi. It often functions as a copula for inchoative nonverbal clause constructions (510) and as an auxiliary in passive constructions (511).[112] The verb *wɔt͡sɐk* is also a common LV, with 36 different types of LVCs currently attested in my corpus. These LVCs can be seen in Appendix G.

(510) *xʊj, jəm bu t͡ʂɨz̪m kur* ***vit-i,*** *nʊj?*
INTJ 3SG.PROX two eye blind become-PST no
'Well, his two eyes became blind, no?' (25.484)

[112] For further description of passives in Afghan Wakhi, see §7.2.

(511) *jɐ=pɐjsɐ=ən=ʊt* *t͡sʊ* *çɐt-i,* *ʊstɔd,*
DIST=money=ABL=2SG FACT say-PST teacher

jɐw *drəm* *dəʐ-g* ***nʊ=vit-i.***
3SG.DIST at.PROX take-PRS NEG=become-PST
'Regarding that money you mentioned, teacher, it was not received [lit., 'was not taken'] here.' (p.c. 4/1/2026)

I have identified two clusters of productivity for *wɔt͡sɐk* thus far: INCHOATIVE and PASSIVE. Both of these clusters are intransitive, but they vary in terms of the lexical category of the PV, the inherent qualities of the PV, and *Aktionsart*. Figure 6.5 displays the semantic map for *wɔt͡sɐk*. Descriptions of its two clusters of productivity follow in §6.4.5.1 and §6.4.5.2.

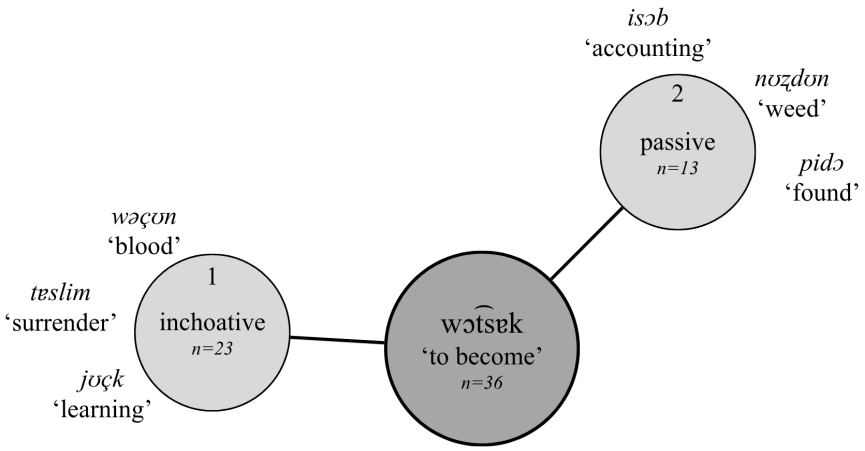


Figure 6.5. Semantic map for *wɔt͡sɐk* 'to become'

6.4.5.1 Inchoative

The first cluster of productivity for *wɔt͡sɐk* is the INCHOATIVE cluster, which includes 23 LVCs. I use the term INCHOATIVE following Haspelmath (1993: 90), who defines it as a predicate that expresses a spontaneous change of state that occurs without the influence of a "causing agent." I supplement Haspelmath's definition with Zavala's (2002: 260) of inchoatives as predicates that express "events or processes that result in the change of state, condition, position, or location of the only participant involved." Cross-linguistically, inchoatives frequently

participate in valency alternations with causatives (cf. Haspelmath 1993: 90; Shibatani 2002: 2–3; Nichols, Peterson & Barnes 2004: 151, 156–157); I discuss such alternations associated with LVCs in §7.3.4.

The LVCs in the INCHOATIVE cluster all denote changes that are internally instigated. The PV for this cluster is a nominal NP that denotes the "state, condition, position, or location" (Zavala 2002: 260) entered or achieved by the subject. Based on inherent properties of the PV, some of the LVCs in this cluster exhibit inceptive semantics. This cluster primarily comprises Achievement predicates with a few Activity predicates as well. The specifications for this cluster are given in Table 6.44.

Although Shibatani (2002: 3) specifies that "inchoative verbs involve a patient undergoer as their protagonist;" the Afghan Wakhi LVCs in this cluster exhibit more variation in the type of argument they take. The LVCs in the INCHOATIVE cluster form five groups based on argument structure, which can be seen in Table 6.45.

Table 6.44. *wɔt͡sɐk*: INCHOATIVE construction

PV:	NP
Aktionsart:	Achievement, Activity

Table 6.45. Sample *wɔt͡sɐk*: INCHOATIVE LVCs

	LVC	Gloss	Meaning	Argument Structure
1	*ɔb wɔt͡sɐk* *wəçʊn wɔt͡sɐk* *xɐtm wɔt͡sɐk*	water become blood become end become	‘to melt’ ‘to bleed’ ‘to end’	<pat> | SUBJ
2	*jʊçk wɔt͡sɐk* *pərɐjfɔn wɔt͡sɐk* *qɐr wɔt͡sɐk*	learning become worried become angry become	‘to learn’ ‘to get worried’ ‘to get angry’	<exp> | SUBJ
3	*d͡ʒɐng wɔt͡sɐk* *tɐslim wɔt͡sɐk* *ʊʈ wɔt͡sɐk*	war become surrender become open become	‘to start fighting’ ‘to surrender’ ‘to open’	<agt~th> | SUBJ
4	*səwɔr wɔt͡sɐk*	horseman become	‘to mount’	<agt~th, gl> | | SUBJ (OBL [‘on’; ‘LOC’])
5	*ɐwɔ wɔt͡sɐk* *nɐjd wɔt͡sɐk*	weather become night become	‘to clear up’ ‘to become night’	avalent

Group 1 of this cluster comprises prototypical inchoatives that take a patient:SUBJ. Sentence (512) gives the example *wəçʊn wɔt͡sɐk* ‘to bleed’ (lit., ‘to become blood’). It is clear from real-world knowledge that the speaker’s hand did not literally “become” (turn into) blood; instead, it bled. I analyze this LVC as an example of an Achievement predicate because as soon as a wound starts to bleed, it enters the state of “bleeding.” However, several other LVCs in this group, such as *lup wɔt͡sɐk* ‘to grow’ (lit., ‘to big become’) in (513), are processes that unfold over time and are therefore Activities.

(512) *ɐ=ðɐj ɐ=ji t͡ʃuɻ vɐj͡tʃ dəzɻ-di,*
EMPH=man EMPH=one piece jug take-PST

də zɻ dɐst=i mɐzɻ duʃ-ti,
LOC 1SG.GEN hand=ACC 1SG hit-PST

NP_{SUBJ}
[*zɻ dɐst*] ***vit-i wəçʊn.***
1SG.GEN hand become-PST blood
'That guy took a piece of that jug and hit me on the hand, (and) my hand bled [lit., 'blood became'].' (21.10)

(513) NP_{SUBJ}
[*jəm*] *kɐm-ʊk=i* ***lup wɔst.***
3SG.PROX a.little-DIM=EZ big become.3SG
'He grows up a little.' (TEX-0014-1.28)

The second group of the INCHOATIVE cluster comprises three LVCs that take an experiencer:SUBJ argument. I analyze all three of these LVCs as Achievements because the Experiencer instantaneously registers the emotional state expressed by the predicate. The LVC *qɐr wɔt͡sɐk* 'to get angry' (lit., 'to angry become') in (514) is an example from this group.

(514) NP_{SUBJ}
[*jɐw*] ***qɐr wɔst.***
3SG.DIST angry become.3SG
'He gets angry [lit., 'angry becomes'].'

Group 3 of this cluster includes LVCs that have an Agent~theme:SUBJ. I use the tilde (~ symbol) to indicate that a single argument simultaneously holds two semantic roles. For this group, that argument is both an Agent that acts volitionally, and a Theme that changes location (whether literally or metaphorically). The LVCs in this group are primarily Achievements because the change of location or position obtains instantaneously when the action occurs. One example from this group is *ʊɻ wɔt͡sɐk* 'to open' (lit., 'to open become') in (516). Sentence (515) immediately precedes (516) in the narrative. It provides context to show that the subject of (516)

(the happy-sounding door, anaphorically referred to by the pronoun *aw* '3SG.DIST') agentively changes position when called by the right name.

(515) *çɐn:* *ɐ* *dɐrwɔzɐ=i* *xʊʃ* *sɐdɔ.*
say.2SG INTJ door=EZ happy sound
'Say, "Hey, happy-sounding door!"' (25.293)

(516) NP_{SUBJ}
[*ɐw*] *tɐr* ***ʊʈ*** ***wɔst.***
3SG.DIST 2SG.DAT open become.3SG
'It will open [lit., 'open become'] for you.'[113] (25.294)

The fourth group of the INCHOATIVE cluster has an Agent~Theme:SUBJ as well as an optional goal:OBL. This group currently contains only one LVC: the Achievement predicate *səwɔr wɔt͡sɐk*, 'to mount' (lit., 'to become a horseman').[114] This LVC is still used with its original meaning 'to mount a horse', as seen in (517). However, it has also been extended to a generic act of getting on or in some mode of conveyance. This may take place on an animal other than a horse, such as a mythical creature (518),[115] or on a modern vehicle, as in (519). Note that I produced example (519) based on my knowledge of Afghan Wakhi as an L2 speaker and on my many experiences hearing native speakers use the LVC *səwɔr wɔt͡sɐk* in conversation with me.

(517) *jɐw* *ɟir-d* *jɐʃ,*
3SG.DIST turn-3SG horse

NP_{SUBJ}
jɐʃ *ʊt* ∅ *əm* *d͡zi* ***səwɔr*** ***wɔst.***
horse and ∅ PROX way horseman become.3SG
'It turns into a horse, (it's) a horse and he mounts [lit., 'horseman becomes'] like this.' (25.552-553)

[113] In the folktale from which this example comes, a number of inanimate objects (such as doors and bridges) are anthropomorphized to have agency and volition.

[114] The Afghan Wakhi equivalent of the English Activity verb 'to ride' is a stative nonverbal predicate construction. For example, *(jɐw) skɐ ji jɐʃ səwɔr* 'He is riding a horse.' (lit., 'He on a horse horseman [is]'.) (25.104)

[115] In (516), the PP *skəm pɐr* 'on her wings' refers to the wings of a magical anthropomorphic partridge.

(518) NP_{SUBJ}

[*kɐ̯ṣ*] ***səwɔr*** ***wɔst*** [*sk=əm pɐr*].

boy horseman become.3SG on=3SG.PROX wing

'The boy mounts [lit., 'horseman becomes'] on her wings.' (25.341)

(519) NP_{SUBJ}

∅ *wəzi* [*də mutɐr*] ***səwɔr*** ***wɔts!***

∅ come.2SG LOC car horseman become.2SG

'Come get in the car!' (lit., 'Come horseman become in the car!') (L2 knowledge)

Group 5 of the INCHOATIVE cluster contains environmental predicates that are avalent; i.e., they do not have any arguments (cf. §6.4.4.11 for a definition and discussion of avalent predicates). The members of this group currently attested in my corpus are Accomplishment predicates because they express an environmental condition that is reached at the end of a process. The LVC *nɐ̯jd wɔt͡sɐk* 'to become night' in (520) is one example from this group.

(520) ***nɐ̯jd*** ***wɔst***

night become.3SG

ʊt didij-d ki nəxt͡ʃir wəz-di.

and see-3SG COMP fox come-PST

'Night fell [lit., 'night becomes'] and he saw that a fox came.' (25.501)

6.4.5.2 Passive

The second cluster of productivity for *wɔt͡sɐk* is the PASSIVE cluster. I call this the PASSIVE cluster because *wɔt͡sɐk* is productively used to create passive LVCs with PVs that form active predicates (in the sense that they are transitive with an agent:SUBJ) when they collocate with a different LV. This cluster currently includes 13 LVCs found in my corpus; however, the *wɔt͡sɐk* passive construction is widespread throughout the grammar of Afghan Wakhi, as I discuss in §7.2 and §7.3.4. These LVCs express an event that has a semantic Agent that is usually not expressed syntactically, while the Patient being acted upon maps to the grammatical relation of subject. The PV for this cluster is an NP that refers to the action being performed

upon the Patient, and the individual properties of a PV determine the *Aktionsart* for its LVC. Table 6.46 displays the features of this construction. The argument structure and several members of this cluster are displayed in Table 6.47.

Table 6.46. *wɔt͡sɐk*: PASSIVE construction

PV:	NP
Aktionsart:	depends on PV

Table 6.47. Sample *wɔt͡sɐk*: PASSIVE LVCs

LVC	Gloss	Meaning	Argument Structure	
bərbɔd wɔt͡sɐk	to-wind become	'to be wasted'	<pat,	agt>
isɔb wɔt͡sɐk	accounting become	'to be counted'	|	|
ʃɐjid wɔt͡sɐk	martyr become	'to be killed'	SUBJ	(OBL ['from'+ABL])

An example of an Achievement predicate belonging to the PASSIVE cluster is given in (521). In this example, the Patient (*nɔziun pʊtr=əʃ* 'the favored sons') is the subject, and there is no syntactic Agent NP. By comparison, in (522) the Agent who gave the command, *nɐd͡ʒib=ən* 'Najib=ABL' is encoded via the Ablative case as an optional oblique argument. Including an oblique Agent in a passive is extremely rare, as evidenced by that fact that this is the only natural example in my corpus of such a construction (cf. §7.2).

(521) NP_{SUBJ}
ʊt [*nɔziun pʊtr=əʃ*] *kɨ* ***ʃɐjid*** ***vit.***
and favored son=PL all martyr become.PST
'And the favored sons were both killed [lit., 'martyr became'].' (25.619)

(522) NP_{SUBJ} NP_{OBL}
[*ji fɐrmɔn*] [*nɐd͡ʒib=ən*] ***sɔdir*** ***vit-i*** *ki . . .*
one command Najib=ABL issue become-PST COMP
'A command was issued from Najib that . . .' (TEX-0023.023)

In this section, I have described the two clusters of productivity for the LV *wɔt͡sɐk* 'to become': the INCHOATIVE cluster and the PASSIVE cluster. Both of these clusters participate in valence alternations, which are the topic of Chapter 7. Having completed my discussion of the five most productive LVs in Afghan Wakhi, I next address a number of less-common LVs.

6.5. Other LVCs

In §6.4, I describe the clusters of productivity for the five most productive LVs currently in my corpus: *t͡sərɐk* 'to do', *çɐk* 'to make', *rədɔwən* 'to give', *dingɐk* 'to hit', and *wɔt͡sɐk* 'to become'. In addition to the five verbs given in §6.4, my current corpus includes 21 other verbs that function as LVs. These LVs exhibit varying degrees of productivity: one LV collocates with nine different PVs, and six are attested in only a single LVC each, with the remainer distributed between those two extremes. At this point, attempting to discover clusters of productivity for these less-productive LVs would be premature because there simply is not enough data to make the patterns clear.

Although I do not analyze lower-frequency LVCs in this dissertation, I do include them in the appendices. LVs for which I have examples of 2-9 types of LVCs are listed in Appendix H. These groups are also given below in descending order according to the number of LVCs currently in my corpus.

The first group of lower-frequency LVCs is formed with the LV *kəʈɐk* 'to put'. These LVCs are given in Table 6.48. All of these LVCs take an agent:SUBJ. Two LVCs in this group, including *ʃtrʊç kəʈɐk* 'to engage' (lit., 'flour put') in (523),[116] are intransitive. The transitive members of this group take either a theme:DO (524), patient:DO (525), or goal:DO (526) as their

[116] The LVCs *ʃtrʊçk kəʈɐk* 'to hold an engagement' (lit., 'to flour put') and *vul kəʈɐk* 'to betrothe' (lit., 'to smell put') both originate from the Afghan Wakhi custom of burning flour as incense during the engagement ceremony.

second argument. The LVC *vul kəʧɐk* ‘to betrothe’ (lit., ‘to smell put’) (527) is currently the only ditransitive member of this group.

Table 6.48. *kəʧɐk* ‘to put’ LVCs

LVC	Gloss	Meaning	Argument Structure
ʃtroçk kəʧɐk	flour put	‘to hold an engagement’	<agt>
ʧ͡ʃil kəʧɐk	headscarf put	‘to put on a headscarf’	<agt>
dɐ kɐf kəʧɐk	in palm put	‘to hand over’	<agt, th>
tər vədɔk kəʧɐk	over to road put	‘to send away’	<agt, th>
tɐdɐw kəʧɐk	foundation put	‘to found (building)’	<agt, pat>
dɐst kəʧɐk	hand put	‘to shoot’	<agt, gl>
jiʂ kəʧɐk	ear put	‘to listen’	<agt, gl>
mis kəʧɐk	nose put	‘to chase’	<agt, gl>
vul kəʧɐk	smell put	‘to betrothe’	<agt, th, rec>

(523) NP_{SUBJ}

∅ *tru mɨj bɐd* ***ʃtroç kɐʧ-ən.***

∅ three month subsequent flour put-1PL

‘Three months later we will hold the engagement (lit., ‘flour put’).’ (TEX-0003.042)

(524) NP_{SUBJ} NP_{DO}

[*wuz*] [*tɐw*] *ji lɔj d=ɐ* ***kɐf kɐʧ-əm.***

1SG.NOM 2SG one time LOC=3SG.DIST palm put-1SG

‘I will hand you over to him once.’ (lit., ‘I will put you in his palm one time.’) (04.39)

(525) NP_{SUBJ} NP_{DO}

∅ [*jəm=i*] ***tɐdɐw*** ***kɐʧ-ən.***

∅ 3SG.PROX=ACC foundation put-1PL

‘We found it [the building].’ (lit., ‘We foundation-put it.’) (TEX-0096.05)

(526) NP_{SUBJ} NP_{DO}

∅ [*çɨ tɐt nɐn qisɐ=i*] ***jiʂ kɐʧ.***

∅ self.GEN father mother story=ACC ear put.2SG

‘Listen to [lit., ‘ear put’] your parents’ words.’ (Prov. 23:22)

(527) NP_{SUBJ} NP_{DO} NP_{IO}

[*sɐk*] *rʊʧ͡ʂ-ən,* [*jɐw=i*] [*tɐrək*] ***vul*** ***kɐʧ-ən.***

1PL.NOM go-1PL 3SG.DIST=ACC 2SG.DAT smell put-1PL

‘We will go and betrothe [lit., ‘smell put’] her for you.’ (02.54)

Table 6.49 displays the eight LVCs in my corpus that are formed with the LV *jundɐk* 'to carry'. Of these, four are intransitive (528) and three are transitive. All of these LVCs take either an agent:SUBJ or experiencer:SUBJ. Examples of intransitive clauses with an Agent and an Experiencer can be seen in (528) and (529), respectively. The transitive LVCs in this group take either a patient:DO (530), theme:DO,[117] or stimulus:DO (531) as their second argument.

Table 6.49. *jundɐk* 'to carry' LVCs

LVC	Gloss	Meaning	Argument Structure
ðɐj jundɐk	husband carry	'to marry a man'	<agt>
kɔnd jundɐk	wife carry	'to marry a woman'	<agt>
dəriw jundɐk	harvest carry	'to harvest'	<agt>
rəndʒ͡ jundɐk	suffering carry	'to suffer'	<exp>
t͡sʊ bʊjnən jundɐk	from middle carry	'to kill'	<agt, pat>
tɐ prʊt jundɐk	to front carry	'to advance, to carry out'	<agt, th>
t͡sʊ dɐstən jundɐk	from hand carry	'to seize'	<agt, th, src>
bɐd jundɐk	bad carry	'to dislike'	<exp, stim>

(528) NP_{SUBJ}
jɔ tirɐmɔ ɐ=v=ər [*sɐk*] ***dəriw jut-i.***
or autumn 3.DIST=PL.OBL=DAT 1SG.NOM harvest carry-PST
'Or in autumn we harvested [lit., 'harvest carried'] for them.' (TEX-0023.020)[118]

(529) NP_{SUBJ}
[*jɐw*]*=əˌs* *bʊ* ***rəndʒ͡*** ***jund.***
3SG.DIST=IPFV also suffering carry.3SG
'He also suffers.' (lit., 'He also suffering carries.') (TEX-0098.13)

(530) NP_{SUBJ} NP_{DO}
[*ɐ=mɐriz-i*] [*ɐw*] ***t͡sʊ*** ***bʊjn=ən*** ***jut-i.***
EMPH=ill-NMLZ 2SG from middle=ABL carry-PST
'That illness killed him.' (lit., 'That illness from the middle took him.')

[117] I have no recorded examples of the LVC *tɐ prʊt jundɐk* 'to carry out, to advance' (lit., 'to front carry') in my corpus. However, I have heard native Afghan Wakhi speakers use this LVC many times to talk about carrying out a task or program.

[118] Although I suspect it may be possible to include a theme:DO for *dəriw jundɐk* 'to harvest' (lit., 'to harvest carry'), I currently have no such examples in my corpus.

(531) NP_{SUBJ} NP_{DO}

∅ ***bɐd=əʂ*** [*ɐw*] ***jut-i.***

∅ bad=IPFV 3SG.DIST carry-PST

'He disliked [lit., 'bad carried'] him.' (25.008)

The LV *wʊdərɐk* 'to hold' occurs in seven different LVCs in my corpus. Two of these are typical transitives with an agent:SUBJ and either a patient:DO or a theme:DO (532) – (533), and one is transitive predicate with an agent:SUBJ and a stimulus:DO. There is also a cognition predicate that takes an agent:SUBJ and a postverbal situation:DO complement clause (534). The remaining members of this group are avalent weather predicates.[119] The *wʊdərɐk* LVCs are given in Table 6.50.

Table 6.50. *wʊdərɐk* 'to hold' LVCs

LVC	Gloss	Meaning	Argument Structure
mɐdinɐzɐr wʊdərɐk	consideration hold	'to consider'	<agt, pat>
qisɐ wʊdərɐk	story hold	'to obey'	<agt, stim>
ðir wʊdərɐk	far hold	'to avoid'	<agt, th, src=ABL>
tɐsmim wʊdərɐk	decision hold	'to decide'	<agt, sit>
ɐwɔ wʊdərɐk	weather hold	'to precipitate moderately'	avalent
bɔrɪʃ wʊdərɐk	rain hold	'to rain moderately'	avalent
ʂɐçʊk wʊdərɐk	hail hold	'to hail heavily'	avalent

(532) NP_{SUBJ} NP_{DO}

[*jəm*] [*çɨ tɐt*] ***qisɐ nʊ=wʊdər-t.***

3SG.PROX self.GEN father story NEG=hold-3SG

'He doesn't obey his father.' (lit., 'He doesn't story-hold his father.')[120] (TEX-001401.54)

[119] Since all weather predicates occur in identical impersonal constructions regardless of the LV used, I do not provide examples of every individual weather LVC. I refer readers to examples (507) and (518) to see similar constructions. I compare the various weather predicates in §6.6.

[120] The LVC *ðir wʊdərɐk* 'to avoid' (lit., 'to far hold') is synchronically intransitive. I include it with other transitive predicates because I reconstruct it as etymologically transitive based on its reflexive structure, just as I do for *pɐxpɐx çɐk* 'to creep' (lit., 'to flat-flat make'; cf. §6.4.2.2).

(533) NP_{SUBJ} NP_{DO}
[*bi-ɐql*] *t͡s=ɐ=n* [*çɐt*] ***ðir wʊdər-t.***
PRIV-wisdom from=3SG.DIST=ABL self far hold-3SG
'A fool avoids (it) [his father's instruction].' (lit., 'A fool holds himself far from it.')
(Prov. 13:1)

(534) NP_{SUBJ}
[*sak,* *ti* *nɐn*] ***tɐsmim*** ***wɔdɐr-ti***
1PL.NOM 2SG.GEN mother decision hold-PST

CC_{DO}
[*ki* *tu* *bɔjɐd* *ɐrusi* *t͡sɐr*].
COMP 2SG.NOM must marriage do.2SG
'We, your mother decided [lit., 'decision held'] that you must get married.' (02.14)

My corpus currently contains five LVCs formed with the LV *dərzɐk* 'to take', which can be seen in Table 6.51. Two of these LVCs are intransitive, with an agent:SUBJ and an Ablative-marked source:OBL. Two other LVCs formed with *dərzɐk* are transitive, with an agent:SUBJ and either a theme:DO or a stimulus:DO. The final LVC is also transitive, but as an emotion predicate, it takes an experiencer:SUBJ and stimulus:DO. Examples of LVCs with these three different argument structures are given in (535) – (537).

Table 6.51 *dərzɐk* 'to take' LVCs

LVC	Gloss	Meaning	Argument Structure
jɐrk dərzɐk	work take	'to use'	<agt, src=ABL>
səbɐq dərzɐk	lesson take	'to learn'	<agt, src=ABL>
vər dərzɐk	load take	'to bear'	<agt, th>
jɔd dərzɐk	memory take	'to learn'	<agt, stim>
dust dərzɐk	love take	'to love'	<exp, stim>

(535) NP_{SUBJ} PP_{OBL}
[*sɐk*] *filɐn* [*t͡sʊ* *kimɐn=ən*] *=əʂ* ***jɐrk*** ***dərz-ən.***
1PL.NOM currently from Keyman=ABL=IPFV work take-1PL
'We are currently using Keyman [keyboard software].' (lit., 'We currently from Keyman work take.') (p.c. 01/27/1015)

(536) NP_{SUBJ} NP_{DO} NP_{DO}
[*ʂtər*] [*bist*], *ji* *ləj* [*t͡ʃil sir*] ***vər*** ***dərz-d.***
camel twenty one time forty sir load take-3sg
'A camel bears [lit., 'load takes'] twenty, sometimes [even] forty *ser*.' [121] (Camels 9)

(537) NP_{SUBJ} NP_{DO}
[*əm* *pɔtʃɔ*] [*əm* *çɨ* *xɔr* *pʊtr*] *tumr* ***dust*** *nʊ=**dəz̧-di.***
PROX king PROX self.GEN disfavored son so.much love NEG=take-PST
'This king didn't love his disfavored son very much.'
(lit., 'This king does not so much love take his disfavored son.') (25.006)

Five LVCs in my corpus use the LV *winɐk* 'to see', as shown in Table 6.52. All of these LVCs take an Experiencer argument, but some are intransitive (538), while others are transitive. The two PVs used in the LVCs meaning 'to dream' (*jinɔt* vs. *winɔt*) may be variants of the same word. Regardless, these two examples show that the Stimulus argument (the content of the dream) may map to either a CC_{DO} (539) or an NP_{DO} (540).

Table 6.52. *winɐk* 'to see' LVCs

LVC	Gloss	Meaning	Argument Structure
d͡ʒizɔ winɐk	punishment see	'to experience punishment'	<exp>
tɐmɔmi zindɐgi winɐk	all of life see	'to live a long life'	<exp>
zɐmɐt winɐk	trouble see	'to experience trouble'	<exp>
jinɔt winɐk	dream see	'to dream'	<exp, stim>
winɔt winɐk	dream see	'to dream'	<exp, stim>

(538) *jəm* *kɐʂ* *kur* *vit-i,*
PROX boy blind become-PST

NP_{SUBJ}
jəm *ki* ∅ *tum* ***zɐmɐt*** ***win-di*** *t͡sʊj.*
3SG.PROX COMP ∅ this.much trouble see-PST COP.FACT
'This boy became blind, the one who experienced so much trouble [lit., 'so much trouble saw'].'(25.490)

[121] A *ser* is an Afghan unit of measure equivalent to 7 kg / 15.4 lbs.

(539) NP_{SUBJ}

∅	***jinɔt=ʊt***	***win-di***
∅	dream=2SG	see-PST

CC_{DO}

[*ji xɐlg wəz-di*].

one person come-PST

'You dreamed [lit., 'dream saw'] (that) a person came.' (22.05)

(540) NP_{SUBJ} NP_{DO}

ini	[*mɐz̨*]	[*ɐw=i*]	***winɔt***	***win-di***.[122]
DISC	1SG	3SG.DIST=ACC	dream	see-PST

'Here, that's what I dreamed [lit., 'dream saw'].' (25.028)

The verb *rʊt͡ʂɐk* 'to go' is attested in five LVCs in my corpus; these LVCs are given in Table 6.53. This group of LVCs (particularly the ones with PPs as PVs) is another set that sits near the inceptive end of the LVC spectrum. Although several of these LVCs look like they could just be intransitive predicates with an adverbial PP, they do meet my non-compositionality criterion (§6.2). Each of these LVCs has a different argument structure. The LVC *skɐ X t͡sbɐs rʊt͡ʂɐk* 'to follow' (lit., 'to on X's back go') takes an agent:SUBJ and a goal:GEN argument; that is, the entity being followed is coded as an adnominal possessor inside the PV, as seen in (541). Similarly, the LVC *t͡sʊ X jɔdən rʊt͡ʂɐk* 'to be forgotten' (lit., 'to from X's memory go') takes a stimulus:SUBJ and an experiencer:GEN that is coded as an adnominal possessor inside the PV (543). One of these LVCs is intransitive with a patient:SUBJ (543), and the final LVC is an avalent weather predicate (544).

[122] The Default case pronoun *mɐz̨* '1SG' is an example of DSM (cf. §3.1.3.10). It is clearly the experiencer:SUBJ argument in this clause for two reasons: (1) subjects precede direct objects in basic clauses (cf. §1.7 and §4.1.1); and (2) the pronoun *ɐw=i* '3SG.DIST=ACC' is marked for Accusative case, and thus can only function as a direct object in this clause (cf. §3.1.3.3).

Table 6.53. *rʊʈʂɐk* ‘to go’ LVCs

LVC	Gloss	Meaning	Argument Structure
skɐ X tsbɐs rʊʈʂɐk	on X’s back go	‘to follow’	<agt, gl [NP_{POSS}] >
tsʊ X jɔdən rʊʈʂɐk	from X’s memory go	‘to be forgotten’	<stim, exp [NP_{POSS}]>
tsʊ X dɐstən rʊʈʂɐk	from hand go	‘to get lost’	<th, src [NP_{POSS}]>
tsʊ bʊjnən rʊʈʂɐk	from middle go	‘to pass away’	<pat>
bɔrɪʃ rʊʈʂɐk	rain go	‘to rain’	avalent

(541) NP_{SUBJ} NP_{POSS}
[*jəm pɐlɐng*] *bʊ* ***sk=[əm dʒɔndɔr] tsbɐs rʊç-k,*** *nʊj?*
PROX leopard also on=PROX MP.sheep back go-PRS no?
‘This snow leopard is also following the Marco Polo sheep, no?’
(lit., ‘This snow leopard also on the Marco Polo sheep’s back has gone, no?’))
(Hunting 18)

(542) *ji winɔt=əm win-di,*
one dream=1SG see-PST

NP_{SUBJ} NP_{POSS}
[*ɐw*] ***tsʊ*** [***ʐi***] ***jɔd=ən rəwj-di,*** *sɐji=ɐ?*
3SG.DIST from 1SG.GEN memory=ABL go-PST okay=Q
‘I had a dream, and I forgot it [lit., ‘it from my memory went]’, okay?’ (25.017)

(543) NP_{SUBJ}
də sɔl-ɔnɐ [*ji tifl*] *bʊt* ***tsʊ bʊjn=ən nʊ=rʊʃt.***
LOC year-ADV one child also from middle=ABL NEG=go-3SG
‘On a yearly basis, not one child passes away anymore.’
(lit., ‘One child also from the middle does not go.’) (TEX-0132.45)

(544) *də ji dʒɐj=əm rəwj-di*
LOC one place=1SG go-PST

ki ***bɔrɪʃ ɣɐ*** *ziɔt* ***rʊç-k.***
COMP rain INTS a.lot go-PRS
‘I went someplace where it had rained [lit., (it) had rain gone’] a lot.’ (15.07)

The verb *wəzɐjən* ‘to come’ occurs as an LV in four LVCs in my corpus, all of which are given in Table 6.54. Two of these LVCs are intransitive with a patient:SUBJ; one example can be seen in (545). The LVC *bɐs wəzɐjən* ‘to be able’ (lit., ‘to enough come’) presents an interesting

case because its subject does not clearly fit the definition for any of the semantic roles with which I am familiar. At this point, I analyze the subject of *bɐs wəzɐjən* 'to be able' as an Experiencer. This LVC takes a complement clause as a situation:DO; this may be a non-finite complement clause in the typical (preverbal) direct object position (546) or a postverbal finite complement clause (547). An example and discussion of *qɐr wəzɐjən* 'to get angry', the final LVC in this group, can be seen in §6.6.

Table 6.54. *wəzɐjən* 'to come' LVCs

LVC	Gloss	Meaning	Argument Structure
d͡ʒʊʂ wəzɐjən	boiling come	'to boil'	<pat>
sʊrx wəzɐjən	red come	'to get hot'	<pat>
qɐr wəzɐjən	anger come	'to get angry'	<exp [NP$_{POSS}$]>
bɐs wəzɐjən	enough come	'to be able'	<exp, sit>

(545) NP$_{SUBJ}$

∅ *xub* ***sʊrx*** ***wəz-di,***

∅ good red come-PST

kɐr-t=əm *sk=ɐ* *guʂt.*

put-PST=1SG on=3SG.DIST meat

'It [the fire] heated up [lit., 'red came'] well, (and) I put meat on it.' (Hunting 55)

(546) NP$_{SUBJ}$ CC$_{DO}$

xɐj [*wuz*] [*ti* *tɐt=ər* *çən-ɐk*] *nʊ=**bɐs*** ***wəzi-əm.***

INTJ 1SG.NOM 2SG.GEN father=DAT say-INF NEG=enough come-1SG

'Well, I am unable [lit., 'do not enough come'] to tell your father.' (04.24)

(547) NP$_{SUBJ}$ CC$_{DO}$

∅ ***bɐs*** ***wizit*** [*ki* *ti* *tɐt=i* *t͡sʊ* *mɐlim-ij=ən* *niçind*].

∅ enough come.3SG COMP 2SG.GEN father=ACC from teacher-NMLZ=ABL pull.out.3SG

'He can [lit., 'enough comes'] fire your father from teaching.' (05.45)

The LV *d͡ʒɔjɐk* 'to read' also occurs in four LVCs in my corpus. As Table 6.55 shows, all four of these LVCs are PCU predicates. I analyze these LVCs as taking an agent~goal:SUBJ argument (a) because these participants are agentive and volitional (unlike Experiencers, which

are not agentive), and (b) because these participants are the destination for the flow of information. An example representative of this group is given in (548).

Table 6.55 *d͡ʒɔjɐk* 'to read' LVCs

LVC	Gloss	Meaning	Argument Structure
dɐrs d͡ʒɔjɐk	lesson read	'to study'	<agt~gl>
kurs d͡ʒɔjɐk	course read	'to take a course'	<agt~gl>
məktɐb d͡ʒɔjɐk	school read	'to attend school'	<agt~gl>
nəmɔz d͡ʒɔjɐk	Islamic prayers read	'to recite Islamic prayers'	<agt~gl>

(548) NP_{SUBJ}
[*ti* *pʊtr=əʂ*] ***dɐrs*** *nʊ=**d͡ʒɔj-d***.
2SG.GEN son=IPFV lesson NEG=read-3SG
'Your son doesn't study.' (01.01)

The verb *plənɐk* 'to fall' functions as an LV in four weather LVCs, which are given in Table 6.56. In its semantically heavy use, this verb is used specifically of falling from a height. such as a cliff, a tree top, etc. As an LV in weather predicates, it conveys the idea of light precipitation. Like other weather predicates in Afghan Wakhi, these LVCs cannot be causativized, nor can their PVs be made specific (cf. the discussion of weather predicates formed with *dingɐk* 'to hit' in §6.4.4.11). Therefore, I analyze them as avalent predicates. Two *plənɐk* LVCs can be seen in (549).

Table 6.56 *plənɐk* 'to fall' LVCs

LVC	Gloss	Meaning	Argument Structure
ɐwɔ plənɐk	weather fall	'to precipitate lightly'	avalent
bɔrɪʃ plənɐk	rain fall	'to rain lightly'	avalent
ʂɐçʊk plənɐk	hail fall	'to hail lightly'	avalent
zʊm plənɐk	snow fall	'to snow lightly'	avalent

(549) *ji rəwɔr tɐw də çɨ xun niən-g tu*
one day 2SG LOC self.GEN house sit-PRS COP.PST

ki ɐwɔ=ʂ plɐt-i, bɔrɪʃ plɐt-i.
COMP weather=IPFV fall-PST rain fall-PST
'One day you were sitting at home when it was raining [lit., 'it was weather falling'], it sprinkled [lit., 'rain fell'].' (22.01)

Three LVCs in my corpus use the LV *wɔzmɐk* 'to bring'. All three of these LVCs are transitive and take an agent:SUBJ and a patient:DO, as shown in Table 6.57. A representative example from this group using the LV *bʊ d͡ʒɔ wɔzmɐk* 'to fulfill' (lit., 'to place bring') can be seen in (550).

Table 6.57 *wɔzmɐk* 'to bring' LVCs

LVC	Gloss	Meaning	Argument Structure
bʊ dɐst wɔzmɐk	to hand bring	'to acquire'	<agt, pat>
bʊ d͡ʒɔ wɔzmɐk	to place bring	'to fulfill'	<agt, pat>
bʊ wud͡ʒud wɔzmɐk	to existence bring	'to create'	<agt, pat>

(550) NP_{SUBJ} NP_{DO}
∅ [*jɐw*] *bʊ d͡ʒɔ wɔzm-ən.*
∅ 3SG.DIST to place bring-1PL
'We fulfill it [a funeral prayer].' (lit., 'We bring it to place.') (TEX-0285.09)

The verb *jitɐk* 'to eat' is an LV used in three LVCs in my corpus. All three of these LVCs are intransitive predicates with an experiencer:SUBJ, as shown in Table 6.58. The Experiencer of an LVC formed with *jitɐk* has no control over the situation expressed by the predicate, which highly and adversely affects it. One example is the LVC *zɐmɐt jitɐk* 'to suffer hardship' (lit., 'to trouble eat') in (551).

Table 6.58 *jitɐk* ‘to eat’ LVCs

LVC	Gloss	Meaning	Argument Structure
bɐnd̨ jitɐk	stuck eat	‘to get stuck’	<exp>
xtɔ jitɐk	accident eat	‘to suffer an accident’	<exp>
zɐmɐt jitɐk	trouble eat	‘to suffer hardship’	<exp>

(551) NP_{SUBJ}

[*mɐz̨*] *ɣɐ* ***zɐmɐt=i*** ***ziɔt*** ***jit-i.***[123]

1SG INTS trouble=EZ a.lot eat-PST

‘I really suffered a lot of hardship.’ (25.599)

Two LVCs in my corpus use the LV *çənɐk* ‘to say’. Both of these LVCs are intransitive predicates with an agent:SUBJ, as shown in Table 6.59. An example with the LVC *bɐjt çənɐk* ‘to sing’ is given in (552).

Table 6.59 *çənɐk* ‘to say’ LVCs

LVC	Gloss	Meaning	Argument Structure
bɐjt çənɐk	song say	‘to sing’	<agt>
qisɐ çənɐk	story say	‘to speak’	<agt>

(552) NP_{SUBJ}

[*jɐw*] *=ʂ* *ki* *ɣɐ* *xʊʃruj* ***bɐjt*** ***çɐt-i,***

3SG.DIST=IPFV COMP INTS pretty song say-PST

mɐz̨=əʂ *rʊqɔs-i* *kər-t.*

1SG =IPFV dancer-NMLZ do-PST

‘While he was singing [lit., ‘song-saying’] so beautifully, I was dancing.’ (21.04)

The LV *wʊrʊt͡ʂɐk* ‘to remain’ occurs in two different LVCs in my current corpus, both of which take an experiencer:SUBJ. These LVCs are given in Table 6.60, and an example with the LVC *ɐjrɔn wʊrʊt͡ʂɐk* ‘to be surprised’ (lit., ‘to surprised remain’] can be seen in (553). LVCs

[123] In this clause, the Default-case pronoun *mɐz̨* ‘1SG’ is the differentially marked subject of an intransitive predicate (cf. §3.1.3.10).

formed with *wʊrʊʧʂɐk* are Achievements: the Experiencer punctually enters the state expressed by the PV and then continues in that state for an unbounded period of time.

Table 6.60 *wʊrʊʧʂɐk* 'to remain' LVCs

LVC	Gloss	Meaning	Argument Structure
ɐjrɔn wʊrʊʧʂɐk	surprised remain	'to be surprised'	<exp>
xʊdʒɔlɐt wʊrʊʧʂɐk	shame remain	'to be shamed'	<exp>

(553) NP_{SUBJ}
wɔz [*ɐ=ðɐj*] *bʊ* ***ɐjrɔn*** ***wʊrʊj-ni***.
then EMPH=man also surprised remain-PST
'Then also that guy was surprised.' (21.11)

My corpus contains two LVCs formed with the LV *niçindɐk* 'to pull out', as seen in Table 6.61. These LVCs are prototypical transitive predicates that take an agent:SUBJ and a patient:DO. Sentence (554) contains an example from this group.

Table 6.61. *niçindɐk* 'to pull out' LVCs

LVC	Gloss	Meaning	Argument Structure
nʊk niçindɐk	tip pull out	'to sharpen (pencil)'	<agt, pat>
ʂɐj niçindɐk	firing pull out	'to fire (clay)'	<agt, pat>

(554) NP_{SUBJ} NP_{DO}
∅ ***ʂɐj*** [*əm*] ***niçind-ən***.
∅ firing 3SG.PROX pull.out-1PL
'We fire it [the clay oven].' (lit., 'We fire pull-out it.') (TEX-0059.10)

Two LVCs in my corpus are formed with the LV *diʃɐk* 'to know'. As shown in Table 6.62, these LVCs are nonvolitional cognition predicates that take an experiencer:SUBJ and a stimulus:DO. An example containing *ʃɐk diʃɐk* 'to despise' (lit., 'to bad know') is given in (555).

Table 6.62 *diʃɐk* ‘to know’ LVCs

LVC	Gloss	Meaning	Argument Structure
biqɐdr diʃɐk	without value know	‘to devalue’	<exp, stim>
ʃɐk diʃɐk	bad know	‘to despise’	<exp, stim>

(555) NP_{SUBJ} NP_{DO}

∅ *də wɐxt=i xiɐr-ij* ***ʃɐk*** [*ɐ=v̄*] *mʊ=**diʃ***.

∅ LOC time=EZ old-NMLZ bad 3.DIST=PL.OBL PROH=know.2SG

‘In the time of [your parents’] old age do not despise [lit., ‘do not bad know’] them.’ (Prov. 23.22)

Six LVs in my corpus participate in only a single type of LVC. These unique LVCs are listed in Appendix I. As seen in Table 6.63, all six of these LVCs are intransitive. Four of the six take an agent:SUBJ, and one takes a patient:SUBJ. From the agentive LVCs, an example with *d͡ʒɐng pərviɐk* ‘to fight’ (lit., ‘to war strike’; i.e., ‘to fight physically’) can be seen in (556), and an example with the single patientive LVC *ɐlɐl wɐzɐk* ‘to hibernate’ (lit., ‘to hibernation fall’) is given in (557).

Table 6.63. Unique LVCs

LVC	Gloss	Meaning	Argument Structure
d͡ʒɐng pərviɐk	war strike	‘to fight’	<agt>
fɐr jirɐk	spin turn	‘to turn around’	<agt>
qisɐ t͡ʃipɐk	story pluck	‘to gossip’	<agt>
zɐmɐt xəʂɐk	trouble pull	‘to work hard’	<agt>
ɐlɐl wɐzɐk	hibernation fall	‘to hibernate’	<pat>
pəziv θiwɐk	heart burn	‘to feel compassion’	<exp [NP_{POSS}], stim [‘on’]>

(556) NP_{SUBJ}

[*jəm buj=əʃ*] *dr=əm* ***d͡ʒɐng pərvi-ən***.

PROX two=PL.DFLT LOC=PROX war strike-3PL

‘These two fight here.’ (25.124)

(557) NP_{SUBJ}

t͡sʊ ɐwɐl=i d͡ʒɐdi=ən tɔ dɐ=i dɐlu [*nɔɣɐrdum*] ***ɐlɐl*** ***wɐz-d***.
from first=EZ Jadi=ABL until ten=EZ Dalwa bear hibernation fall-3SG
'From the first of Jadi until the tenth of Dalwa bears hibernate.' (Bears 7)[124]

The last of the unique LVCs is *pəziv θiwɐk* 'to feel compassion' (lit., 'to heart burn'). This LVC is extremely fuzzy, to the point that I am unsure whether it is truly an LVC. In spite of its questionable status, I include it here because it shares a feature with several other LVCs in my corpus: namely, the semantic Experiencer is coded as an adnominal possessor inside the putative PV, not as a syntactic grammatical relation. The Stimulus argument, on the other hand, is coded as an oblique via a *skʊ* 'on' PP. In (558), the pronoun *jɐw* '3SG.DIST' is the Experiencer (marked as NP_{POSS}), and the PP *skʊ mɐz̧* 'on me' is the Stimulus.

(558) NP_{POSS} PP_{OBL}

[[*jɐw*] ***pəziv***] [*skʊ mɐz̧*] ***θʊt-k=i*** *ki . . .*
3SG.DIST heart on 1SG burn-PRS=SPEC COMP
'She had compassion on me that . . .' (lit., 'Her heart burned on me.') (16.16)

6.6. Preverbs and LV Alternations

As I mention in §6.2, some PVs can collocate with two or more different LVs. When a PV collocates with multiple LVs, alternations in the choice of LV bring concomitant changes to the semantics of the entire LVC.

For some sets of alternations, the meaning of the PV stays fairly consistent, but the different LVs cause changes to the argument structure (e.g., the number and type of arguments). The word *qɐr* 'anger' is a good example of a PV that contributes a consistent meaning to the LVC in spite of alternations in the LV. In my corpus, four LVs can collocate with *qɐr*: *t͡sərɐk* 'to

[124] Jadi and Dalwa are the tenth and eleventh months of the Afghan calendar, corresponding roughly to the time from December 22–February 19 in the Gregorian calendar.

do', *wəzɐjən* 'to come', *çɐk* 'to make', and *gizʊvɐk* 'to raise'. Examples of LVCs using each of these LVs are given in (559) – (562), respectively.

The use of *t͡səɾɐk* 'to do' contributes an element of intentionality or volitionality to the act of getting angry. In (559), the LVC *qɐr t͡səɾɐk* 'to get angry' carries the implicature that the subject chooses to get angry at this point in time. For this reason, I analyze this LVC as taking an agent:SUBJ. In contrast, when *qɐr* collocates with the LV *wəzɐjən* 'to come' as in (560), the LVC is an emotion predicate that takes an Experiencer. However, the Experiencer is not the subject—in fact, it is not even a syntactic grammatical relation, but the adnominal possessor of the PV—and the predicate is highly non-volitional. From these two examples, it is clear that both *qɐr t͡səɾɐk* and *qɐr wəzɐjən* are inchoative predicates. Despite this shared element of semantics, the two LVCs differ significantly in terms of argument structure and volitionality.

(559) NP_{SUBJ}
[*t͡ʃilgɐzmɐk t͡ʃilgɐzmɨj*] ***qɐr t͡sɐr-t.***
forty.meter.neck forty.meter.hair anger do-3SG
'The forty-meter-necked, forty-meter-haired lady gets angry.' (25.406)

(560) NP_{POSS}
jiwʊk [***ʐɨ***] ***qɐr wəz-d.***
at.once 1SG.GEN anger come.PST
'I got angry at once.' (lit., 'my anger came') (19.03)

Sentences (561) and (562) are examples of two different causative constructions in which *qɐr* 'anger' is the PV. In (561), the LV that collocates with *qɐr* is *çɐk* 'to make'. With this LV, an external Stimulus functions as the subject, and the Experiencer is coded as the direct object. Although the LVC with *gizʊvɐk* 'to raise' (lit., 'cause to rise') has an agent:SUBJ, as seen in (562), the Experiencer in this construction is encoded as the adnominal possessor of the PV just as the Experiencer of *qɐr wəzɐjən* is in (560).

(561) NP_{SUBJ} NP_{DO}
[*tɐw*] [*mɐzˌ*] ***qɐr*** ***gɔç-ti.***
2SG 1SG anger make-PST
'You made me angry.'

(562) *xɐj* *jəm* *d͡zi*
INTJ PROX way

NP_{SUBJ} NP_{POSS}
ki [*tu*] *=ʂ* [***zɻ***] ***qɐr=i*** ***giz-ʊv*** . . .
COMP 2SG.NOM=IPFV 1SG.GEN anger=ACC rise-CAUS.2SG
'Well, because you are angering me like this . . .'
(lit., 'you raise my anger') (02.57)

While examples (559) – (562) demonstrate how alternations in the LV can change the syntactic arguments and the semantic roles associated with those arguments, examples (563) – (566) illustrate a different set of effects that result from changing the LV. In these examples, the PV *qisɐ* 'story' is collocated with four different LVs: *t͡sərɐk* 'to do', *çənɐk* 'to say', *wʊdərɐk* 'to hold', and *t͡ʃɨpɐk* 'to pluck', respectively. I translate both *qisɐ t͡sərɐk* (563) and *qisɐ çənɐk* (564) as 'talk'. These two LVCs both take a single agent:SUBJ argument, and they seem to be used somewhat interchangeably by native speakers, so at this time I am not sure what the difference is between them. Other collocations with *qisɐ* convey very different, non-compositional meanings. For example, the collocation of *qisɐ wʊdərɐk* (lit, 'to story hold') in (565) means 'to obey' and takes an agent:SUBJ and a stimulus:DO. However, the LVC *qisɐ t͡ʃɨpɐk* (lit., 'to story pluck') is an intransitive, agentive predicate that means 'to gossip' (566).

(563) *dɐ* *ji* *d͡ʒɐj* *rəwʲ-di*
LOC one place go-PST

NP_{SUBJ}
ki [*jɐw*] *=əˌʂ* ***qisɐ*** ***t͡sɐr-t.***
COMP DIST=IPFV story do-3SG
'They went to a place where that one is talking [lit., 'story doing'].' (TEX-0027.09)

(564) NP_{SUBJ}

∅ ***qisɐ*** *nʊ=**çɐn-d**.*

∅ story NEG=say-3SG

'He doesn't talk.' (lit., 'He doesn't story say.') (25.250)

(565) NP_{SUBJ} NP_{DO}

[*jəm*] [*çɨ* *tɐt*] ***qisɐ*** *nʊ=**wʊdər-t**.*

3SG.PROX self.GEN father story NEG=hold-3SG

'He doesn't obey his father.' (lit., 'He doesn't story hold his father.') (TEX-001401.54)

(566) NP_{SUBJ}

[*jʊt* *xɐlg*] *mʊdɔm* ***qisɐ*** ***t͡ʃɨp-t**.*

MED person always story pluck-3SG

'That person always gossips [lit., 'story plucks'].'

The topic of weather and environment predicates is semi-adjacent to the topic of LV alternations. So although it is not precisely the same phenomenon, I discuss it briefly here. Throughout this chapter, I have identified several different weather predicates. These LVCs are collated in Table 6.64.

Table 6.64. Weather and environment LVCs

LVC	Gloss	Meaning
ɐwɔ dingɐk	weather hit	'to precipitate heavily'
zʊm dingɐk	snow hit	'to snow heavily'
bɔrɪʃ rʊt͡ʂɐk	rain go	'to rain'
ɐwɔ plənɐk	weather fall	'to precipitate lightly'
bɔrɪʃ plənɐk	rain fall	'to rain lightly'
ʂɐçʊk plənɐk	hail fall	'to hail lightly'
zʊm plənɐk	snow fall	'to snow lightly'
ɐwɔ wʊdərɐk	weather hold	'to precipitate moderately'
ʂɐçʊk wʊdərɐk	hail hold	'to hail heavily'
ɐwɔ wɔt͡sɐk	weather become	'to clear up'
nɐjd wɔt͡sɐk	night become	'to become night'

All of these constructions could conceivably be analyzed as having regular lexical verbs with a weather condition as the theme:SUBJ. However, as I discuss in §6.4.4.11, these constructions cannot be causativized, nor can the weather or environmental condition expressed

by the PV be made specific. Therefore, I analyze these constructions as avalent (lacking arguments) LVCs (cf. Dryer 2007: 267; Velupillai 2012: 258).

Another topic adjacent to the subject of LV alternations is that of LVCs with a *t͡sʊ* 'from'+ABL PP as their PV. Two of these PVs, *t͡sʊ dɐstən* 'from hand' and *t͡sʊ bʊjnən* 'from middle' are involved in similar LV alternations, as seen in the second and third groups in Table 6.65. The meanings of the LVCs formed with these PVs are non-compositional. However, they exhibit similarities in their alternation patterns: when the PVs collocate with *jundɐk* 'to carry' (Group 2), they form active, transitive predicates; but when they collocate with *rʊt͡ʂɐk* 'to go' (Group 3), they form inchoative predicates.

Table 6.65. LVCs with Ablative PVs

		LVC	Gloss	Meaning
1	active, non-volitional	*t͡sʊ dɐstən rədɔwən*	from hand give	'to give up, to lose involuntarily'
2	active, volitional	*t͡sʊ dɐstən jundɐk*	from hand carry	'to seize'
		t͡sʊ bʊjnən jundɐk	from middle carry	'to kill'
3	inchoative	*t͡sʊ dɐstən rʊt͡ʂɐk*	from hand go	'to get lost'
		t͡sʊ bʊjnən rʊt͡ʂɐk	from middle go	'to pass away'
		t͡sʊ jɔdən rʊt͡ʂɐk	from memory go	'to be forgotten'

In my experience and corpus, the PV *t͡sʊ jɔdən* 'from memory' collocates only with *rʊt͡ʂɐk* 'to go', as shown in the last row of Table 6.65.[125] This phrase *t͡sʊ jɔdən* strongly resembles a literal Source PP in sentences like (567) and (568). However, I analyze it as a PV, and I analyze the entire collocation *t͡sʊ jɔdən rʊt͡ʂɐk* 'to be forgotten' as an LVC, for several reasons. First, this predicate displays the same inchoative and malefactive semantics exhibited by the

[125] The LVC *t͡sʊ jɔdən rʊt͡ʂɐk* 'to be forgotten' (lit., 'to from memory go') can be either eventive or stative, depending on the verb form used. With a past verb stem (565), it is an Achievement; but with a perfect verb stem (566), it is a State.

other LVCs that have a *t͡sʊ* 'from'+ABL PP as their PV. Second, for Afghan Wakhi speakers, *t͡sʊ jɔdən rʊʈ͡ʂɐk* is the preferred way of expressing the concept of "forgetting" because it carries the connotation of unintentional, non-volitional forgetting. In contrast, the LVC *fɐrɔmuʃ t͡sərɐk* 'to forget' (lit., 'to forgotten do') connotes an active, intentional, volitional choice not to remember.

(567) *ji winɔt=əm win-di,*
one dream=1SG see-PST

NP$_{SUBJ}$ NP$_{POSS}$
[*ɐw*] *t͡sʊ* [*ʐɨ*] *jɔd=ən rəwʐ-di, sɐji=ɐ?*
3SG.DIST from 1SG.GEN memory=ABL go-PST okay=Q
'I had a dream, and I forgot it [lit., 'it left my memory'], okay?' (25.017)

(568) *d=əm sɐr çɐn-əm*
LOC=PROX head say-1SG

NP$_{SUBJ}$ NP$_{POSS}$
ki [*bɐzi*] *t͡sʊ* [*ʐɨ*] *jɔd=ən rʊç-k.*
COMP some from 1SG.GEN memory=ABL go-PRS
'At the beginning I mention that some (parts) have been forgotten [lit., 'have from my memory gone'].' (TEX-0014-1.10)

In this section, I have briefly addressed the topic of LV alternations, i.e., the use of the same PV with different LVs. At this point in time, the two clusters for the LV *wɔt͡sɐk* 'to become' are distinguished by the LV with which they alternate. Other patterns of alternations between other pairs or sets of LVs may emerge over the course of continued study. In some sets of alternations, the general meaning of the predicate stays fairly consistent while the change in LV affects argument structure and / or *Aktionsart*. In other words, the change appears more compositional. However, in other sets of alternations, changing the LV unpredictably changes the meaning of the entire LVC. Additional research is needed to determine if and how LV alternations form clusters of productivity in Afghan Wakhi.

6.7. Arguments and Grammatical Relations in LVCs

Throughout §6.4 – §6.6, I provide the argument structure for each group of LVCs and describe how those arguments map to grammatical relations in the clause. Table 6.66 displays all of the relevant grammatical relations alongside the semantic roles that can be mapped to them, as attested in the LVCs in my corpus. From these data, it is clear that the grammatical relations of subject and direct object are the least restricted in Afghan Wakhi in terms of the semantic roles of the arguments they code, while the mapping restrictions on other grammatical relations are more specific.

Table 6.66. Grammatical relation-semantic role mappings attested in Afghan Wakhi LVCs

Grammatical Relation	**Semantic Roles**
NP_{SUBJ}	Agent, Causer, Experiencer, Patient, Theme, Source, Stimulus, Agent~Theme, Agent~Goal
NP_{DO}	Causee, Patient, Theme, Location, Goal, Stimulus, Situation
NP_{IO}	Recipient
NP_{POSS}	Experiencer, Goal (malefactive)
T-OBJ	Theme
R-OBJ	Recipient
OBL: *t͡sʊ* 'from'+ABL	Source, Stimulus, Agent (rare)
OBL: *də* 'COM'+ABL	Comitative
OBL: *skɐ* 'on'	Goal, Stimulus, Location
OBL: *də* 'LOC'	Goal

I have already described most of these mapping relations, which are fairly straightforward, so I will not discuss them again here. However, one merits particular attention: the use of an adnominal possessor (NP_{POSS}) to code an Experiencer (569) or Goal (570) argument. An argument coded as an NP_{POSS} is highly (and often negatively) affected by the situation (cf. examples (541), (560), and (562)). This use of a non-core grammatical device to code what seem to be core semantic arguments exhibits an unexpected mismatch between

semantics and morphosyntax. The malefactive semantics associated with these adnominal possessor-marked arguments is also typologically interesting and worthy of further study, particularly in light of Haig's (2008: 55–61) description of the Old Persian Genitive as having a bundle of functions (including malefactive) that he analyzes as "maximum indirect participation."

(569) NP_{POSS}
[[***jɐw***] *pəzɨv*] *skʊ* *mɐz̧* *θʊt-k=i* *ki . . .*
3SG.DIST heart on 1SG burn-PRS=SPEC COMP
'She had compassion on me that . . .' (lit., 'Her heart burned on me.') (16.16)

(570) NP_{POSS}
jɐw [*skɐ* [***ti***] *ruj*] *ʃɔdɐt* *rɐnd=i* *ki . . .*
3SG.DIST on 2SG.GEN face witness give.3SG=SPEC
'He will witness against you that . . .' (lit., 'He will on your face witness give that . . .') (01.20)

6.8. LVC Innovation

As mentioned in §6.1, speakers of languages with large inventories of LVCs tend to use LVCs to innovate new predicates rather than creating new verbs (Butt 2010: 3–4; Bowern 2008: 172; Family 2014: 7). The Afghan Wakhi community is no different: when a new predicate is needed, their preferred strategy is to create a new PV+LV collocation. However, speakers do not associate PVs and LVs at random; rather, they seem to observe some shared, principled, and (from a researcher's perspective) frustratingly ineffable guidelines when they collocate potential PVs with compatible LVs. In order to understand which PV+LV collocations may or may not be acceptable (and why), we need to figure out the language-specific patterns that govern them. The work I have done in §6.4 –§6.5 to identify and describe clusters of productivity associated with different LVs in Afghan Wakhi is an important step toward fulfilling this goal.

Many recent LVC innovations are easily identifiable by their PVs, which are often technology-related words borrowed from English. True to the cross-linguistic pattern observed

by Bowern (2008: 172), in Afghan Wakhi, the default LV used with borrowed PVs is *t͡sərɐk* ‘to do’. Two examples of innovative LVCs made with *t͡sərɐk* are *kuntrul t͡sərɐk* ‘to control’ (571) and *tɔjp t͡sərɐk* ‘to type’ (572).

(571) *mutɐr bɔjɐd tu* ***kuntrul t͡sɐr!***
car must 2SG.NOM control do.2SG
‘Control the car!’

(572) *tu=ʂ* ***t͡ʃiz tɔjp t͡sɐr?***
2SG.NOM=IPFV what type do.2SG
‘What are you typing?’ (L2 knowledge)

Although many innovative LVCs use the LV *t͡sərɐk*, others collocate with different LVs. The LV used in an innovative LVC is based on the properties of the PV and semantic similarities between the new LVC and existing LVCs, which allow speakers to essentially slot the new predicate into an existing cluster of productivity (i.e., into an existing collostructural pattern). For example, the LVCs *trining rədɔwən* ‘to train’ (573) and *siminɔr rədɔwən* ‘to teach’ (574) both use the LV *rədɔwən* ‘to give’. Presumably, these PVs were innovated based on analogy to the native LVC *dɐrs rədɔwən* ‘to teach’, which is a member of the TRANSFER cluster for *rədɔwən* (cf. §6.4.3.1).

(573) *jɐn rʊʂt,*
then go.3SG

pɐs əm kɐʂ jiw=i dəjɐr bʊ drɐ ***trining rɐnd.***
after PROX boy one=EZ another also at.DIST training give.3SG
‘Then she [the chukar partridge] goes, (and) afterward she trains this boy there once again.’ (25.352)

(574) *jəm d͡zi gɔ=v=i kɨ əm=ər* ***siminɔr rɐnd.***
PROX way do=PL.OBL=ACC all 3SG.PROX=DAT seminar give.3SG
‘Like this she teaches him everything.’ (25.319)

Another LV involved in LVC innovation is *dingɐk* ‘to hit’. As discussed in §6.4.4.6, one cluster of productivity associated with *dingɐk* is the ITR: PLAY INSTRUMENT cluster. As new

instruments have made their way to the Afghan Wakhi, speakers have innovated new LVCs within this cluster. For example, in the LVC for 'to play the keyboard' (575), the PV *kɔsiu* 'electronic keyboard'[126] is collocated with *dingɐk*.

(575) *d͡ʒʊmɐ gʊl ɣɐ xʊʃruj* ***kɔsiu*** ***dʊʃt***.
Juma Gul INTS beautiful keyboard hit.3SG
'Juma Gul plays the keyboard very beautifully.'

Examples (571) – (575) are by no means an exhaustive set of innovative LVCs. However, these examples demonstrate that the innovation of LVCs is in fact systematic. The clusters of productivity associated with each LV are part of the implicit knowledge shared by native speakers of Afghan Wakhi. This knowledge guides the innovation process, and it also enables us to understand and predict (to a degree) which PVs and LVs may be compatible for future innovations.

6.9. Summary

In this chapter, I have taken an initial step towards describing LVCs and their patterns of productivity in Afghan Wakhi. I have presented some typological and terminological background, followed by an introduction to the basic features of Afghan Wakhi LVCs. This initial background serves as an orientation to the body of the chapter, which is dedicated to identifying and describing the patterns of productivity for five common light verbs. I have also provided examples of LVCs that use less-common light verbs and discussed some of the effects seen when the same PV collocates with different LVs. This work not only lays the foundation for future work to map the patterns of productivity for other light verbs in Afghan Wakhi; it also serves as a model for the study of LVCs in other languages both in Afghanistan and beyond.

[126] The word *kɔsiu* is a borrowing and metonymic extension of the brand name *Casio*.

CHAPTER 7

VALENCY CHANGING CONSTRUCTIONS

In this chapter, I tackle valency changing constructions in Afghan Wakhi. VALENCE is usually defined at the verbal level as the number of core arguments a verb takes; however, given that Afghan Wakhi uses light verb constructions far more productively than lexical verbs, I treat valence as a property of a predicate, not a single lexical item. The term VALENCE can be used to refer to SEMANTIC VALENCE (the number of arguments included in the verb's semantic frame) or SYNTACTIC VALENCE (the number of core syntactic arguments that must be expressed in some way). The distinction between semantic and syntactic arguments can be complicated to tease apart for Afghan Wakhi, which allows a fair amount of argument elision. In spite of the challenges posed by argument elision, I am primarily concerned with syntactic valence.

This chapter is organized around two broad categories of valency-changing constructions that affect predicates in Afghan Wakhi: causatives and passives. CAUSATIVE CONSTRUCTIONS increase the number of core arguments for a particular predicate by adding a Causer (Comrie 1989: 175; Velupillai 2012: 260; Kroeger 2005: 277; Song 2013). Afghan Wakhi makes use of several different causative strategies; these are the topic of §7.1. In contrast, PASSIVE CONSTRUCTIONS decrease the number of core arguments for a predicate by removing an Agent or coding it as an oblique. I discuss the Afghan Wakhi passive construction in §7.2; I also refer readers to §6.4.5.2 for an overview of passive LVCs.

As mentioned in §6.6, a number of light verb constructions in Afghan Wakhi exhibit alternations in the LVs that collocate with a particular PV. Some of these alternations form groups that exhibit systematic valency differences (e.g., one LV is associated with a higher valence, and another with a lower valence). LV alternations associated with valency changes are

EQUIPOLLENT; that is, neither valence construction can be classified as more basic because both are equally derived (cf. Haspelmath 1993: 91). I describe the patterns associated with these types of LV alternations in a dedicated section (§7.3).

7.1. Causative Constructions

Causative constructions increase the valence of a predicate by introducing a new causer:SUBJ argument. Causative constructions commonly derive transitive predicates from intransitive ones; in many languages they may also derive ditransitives from transitives, although sometimes only a restricted class of transitives can be causativized by one strategy or another (Payne 1997: 178; Dixon 2010b: 241). Different causative strategies found cross-linguistically include lexical causatives, morphological causatives, serial verb constructions, periphrastic constructions, and auxiliary alternations (Dixon 2000: 33–41).

Cross-linguistically, the effect that the causative derivation and addition of a causer:SUBJ argument has on a predicate's argument structure depends partly on the causative strategy used and partly on the predicate's basic valence.[127] For example, a morphological causative strategy usually affects the mapping of core arguments to grammatical relations, and subsequently also the case marking used to flag those arguments (for languages that have case), because the arguments of two semantic predicates (causation and caused action) "have to be combined together into one single set of arguments [for a single predicate]" (Comrie 1989: 175). When an intransitive predicate in a language with nominative-accusative case alignment undergoes morphological causation, the original syntactic subject becomes a causee:DO, typically flagged with the Accusative case (Comrie 1989: 175; Dixon & Aikhenvald 2000: 13; Dixon 2000: 31). A transitive predicate already has a subject and a direct object, so a morphological causative affects

[127] By "basic valence," I mean the valence associated with the underived form of a predicate.

its argument structure differently. In this case, the new Causer still maps to subject, but it is common for the Causee to become an indirect object argument and (in a language with case) to receive Dative case marking (Comrie 1989: 175–176, 181).

Although morphological causatives have the potential to affect both argument structure and case marking, periphrastic causatives typically do neither. In a periphrastic causative construction, the causing event and the caused situation are usually expressed in main and subordinate clauses, respectively, each of which may retain its own argument structure. That is, the Causer is the grammatical subject of the main clause, and the argument structure (and case marking of arguments) for the predicate in the subordinate (caused situation) clause is unchanged, regardless of whether the original clause was transitive or intransitive (Comrie 1989: 175).

Speakers of Afghan Wakhi make use of two causative strategies: morphological causatives and periphrastic causatives. Morphological causatives (§7.1.1) are restricted primarily to basic intransitive predicates. Periphrastic causatives (§7.1.2) are much more common; they can be used with intransitive, transitive, and ditransitive predicates alike.

7.1.1 Morphological Causatives

In Afghan Wakhi, the suffix *-ʊv ~ -ɔv* 'CAUS' increases the valence of a nonpast or past lexical verb.[128] This suffix almost exclusively derives transitive verbs from intransitive verbs and could be considered merely a transitivizing suffix. However, on rare occasions, the suffix *-ʊv ~ -ɔv* can also be used to derive a ditransitive predicate from a transitive one. Therefore, I analyze this suffix as a causativizer and gloss it as CAUS.

[128] The transitivizing morpheme *-ʊv* undergoes ablaut in the past tense to become *-ɔv*. This change is not phonologically motivated, but is conditioned solely by the change in tense.

My data currently include 11 intransitive lexical verbs that can take the causative suffix. These verbs and their causative correlates are given in Table 7.1 along with their arguments.

Table 7.1. Intransitive-causative verb pairs

	Intransitive	**NP$_{SUBJ}$**	**Causative**	**NP$_{SUBJ}$**	**NP$_{DO}$**
1	*gizɐk* ‘to rise’	Agent	*gizʊvɐk* ‘to raise’	Causer	Causee
	gʊfsɐk ‘to run’	Agent	*gʊfsʊvɐk* ‘to cause to run’	Causer	Causee
	rəwzɐk ‘to jump’	Agent	*rəwzʊvɐk* ‘to cause to jump’	Causer	Causee
	ʃʊxsɐk ‘to pass by’	Agent	*ʃʊxsʊvɐk* ‘to cause to pass by’	Causer	Causee
	t͡ʃərmɐk ‘to enter’	Agent	*t͡ʃərmʊvɐk* ‘to cause to enter’	Causer	Causee
	xəmɐk ‘to descend’	Agent	*xɐmʊvɐk* ‘to cause to descend’	Causer	Causee
	ʝəʈɐk ‘to arrive’	Agent	*ʝɐtʊvɐk* ‘to cause to arrive’	Causer	Causee
2	*ʂkəndɐk* ‘to break’	Patient	*ʂkʊndʊvɐk* ‘to cause to break’	Agent	Patient
	ʝirɐk ‘to turn’	Agent~Theme	*ʝirʊvɐk* ‘to overturn, to spill’	Agent	Theme
	təpɐk ‘to shake’	Theme	*tɐpʊvɐk* ‘to cause to shake’	Agent	Theme
3	*wʊʂɐk* ‘to fear’	Experiencer	*wʊʂʊvɐk* ‘to frighten’	Stimulus	Experiencer

Two patterns are evident in Table 7.1. First, in the data currently available, one group comprises active intransitives (cf. Shibatani & Pardeshi 2002: 86); a second group includes inchoatives (cf. §6.4.5.1); and a third group (of one) is an emotion predicate. Second, the semantic role of the new argument and the reanalysis of the original single argument are both predictable based on the argument structure of the intransitive verb. In Group 1 (active verbs), a new causer:SUBJ is added, and the original Agent becomes a causee:DO. For Group 2 (inchoative verbs), the new argument is an agent:SUBJ, and the original Patient or Theme is remapped to

direct object without changing semantic role; the one original Agent~Theme loses its agency and becomes simply a Theme. Finally, for Group 3 (emotion verbs), a new stimulus:SUBJ is acquired, and the original Experiencer becomes the direct object.

Several examples containing intransitive-causative verb pairs are given below. These examples illustrate the effects that the causativizing suffix has on different types of predicates. An active intransitive-transitive pair is seen in (576) – (577); an inchoative-causative pair is given in (578) – (579), and an emotion intransitive-transitive pair is given in (580) – (581).

(576) *kərʐʊpʧ ji ləj ʂɨ sɐr niçind,* <agt>
magpie$_i$ one time self.GEN head pull.out.3SG |
SUBJ

NP$_{SUBJ}$
*wɔz ∅ **rəwʊz-d**.*
then ∅$_i$ jump-3SG
'The magpie will pull its head out once and then (it will) jump down.' (25.372)

(577) NP$_{SUBJ}$ NP$_{DO}$ <csr, cse>
[*əm kɐʂ*] [*əm jɐʃ=i*] *dərz-d* | |
PROX boy 3SG.PROX horse=ACC$_i$ take-3SG SUBJ DO
NP$_{DO}$
ʊt rə dərjɔ [*əm*] ***rəwz-ʊv-d**.*
and down.to river 3SG.PROX$_i$ jump-CAUS-3SG
'The boy takes his [the ogre's] horse and jumps it down into the river.' (25.129)

(578) NP$_{SUBJ}$ <pat>
[*jəm mʊʃqɔb*] *ʦʊ ʐɨ kɐf=ən wɐʂ-ti, **ʂkən-i**.* |
PROX plate from 1SG.GEN palm=ABL fall-PST break-PST SUBJ
'This plate fell from my hand and broke.' (07.14)

(579) *mɐʐ qɐr kər-ti,*
1SG anger do-PST

NP$_{SUBJ}$ NP$_{DO}$ <agt, pat>
∅ [*jəm*]*=əm **ʂkʊt-ɔv-di**.* | |
∅ 3SG.PROX=1SG break-CAUS-PST SUBJ DO
'I got angry, and I broke it.' (08.19)

(580) NP_{SUBJ} <exp>

∅ ɐn=ən t͡s=ɐn ɣɐf͡ʃ **wuʂ-ti**. |

∅ then=1PL from=DIST INTS fear-PST SUBJ

'Then we were very afraid of it.' (Bear Encounter 04)[129]

(581) NP_{SUBJ} NP_{DO} <stim, exp>

[jəm=əʃ] [mɐz̩=i] **wuʂ-ɔv-di**. | |

3=PL.DFLT 1SG=ACC fear-CAUS-PST SUBJ DO

'They frightened me.' (N01.93)[130]

The causative suffix is infelicitous with most transitive verbs. For example, consider the verb *jit* 'eat.3SG', which as shown in (582) is a transitive verb with an agent:SUBJ and patient:DO. Native speakers reject the addition of *-ʊv ~ -ɔv* to this verb, as shown in (583). Instead, they prefer to use a different lexical verb, such as *rədɔwən* 'to give' in (584).

(582) NP_{SUBJ} NP_{DO} <agt, pat>

[z̩i zɐ] [ʂʊt͡ʃ] **jit**. | |

1SG.GEN child bread eat.3SG SUBJ DO

'My child eats bread.'

(583) *[wuz] [ʂi zɐ=ɾ] [ʂʊt͡ʃ] **jit-ʊv-əm**.

1SG.NOM self.GEN child=DAT bread eat-CAUS-1SG

intended: 'I make my child eat bread.'

(584) NP_{SUBJ} NP_{IO} NP_{DO} <agt, rec, th>

[wuz] [ʂi zɐ=ɾ] [ʂʊt͡ʃ] **rɐnd-əm**. | | |

1SG.NOM self.GEN child=DAT bread give-1SG SUBJ IO DO

'I give bread to my child.' (i.e, 'I feed my child bread.')

So far, I have found only two transitive verbs that can felicitously undergo morphological causation: *pumt͡sɐk* 'to put on X' and *d͡ʒɔjɐk* 'to read'. These verbs each undergo different changes in argument structure as a result of morphological causation. In the first, a new agent:SUBJ is added, and the original Agent~Goal becomes simply a goal:IO; in the second, a new

[129] A Stimulus can be expressed for the intransitive emotion predicate *woʂɐk*, but only as a Source argument coded as a *t͡sʊ* 'from'+ABL PP.

[130] This example comes from the unpublished corpus collected by the late Simone Beck, which she shared with me before her untimely passing in 2017.

causer:SUBJ is added, and the original Agent becomes a causee:R-OBJ. In both cases, the original theme:DO is unaffected.

The verb *pumt͡sɐk* 'to put on X' (where X is an article of clothing) undergoes the first change; that is, the agent~goal:SUBJ of the transitive clause maps to the goal:IO of the ditransitive clause. In its underived form, this verb is transitive with an agent~goal:SUBJ and a theme:DO, as seen in (585). However, when the causative suffix is added, as in (586), the verb's meaning becomes 'to put X on Y'. It acquires a new agent:SUBJ argument, and the original agent~goal:SUBJ becomes merely the goal:IO; the theme:DO is unchanged. Example (586) is interpreted by native speakers as spoken by a parent putting pants on a small child who is not able to dress himself.

(585) NP_{SUBJ} NP_{DO} <agt~gl, th>
[*ʐɨ* *pʊtr*] [*ʃwɔlʊk*] ***pumʊst***. | |
1SG.GEN son pants put.on.3SG SUBJ DO
'My son is putting on pants.'

(586) NP_{SUBJ} NP_{IO} NP_{DO} <agt, gl, th>
[*wuz*] [*çɨ* *pʊtr=ər*] [*ʃwɔlʊk=i*] ***pumt͡s-ʊv-əm***. | | |
1SG.NOM self.GEN son=DAT pants=ACC put.on-CAUS-1SG SUBJ IO DO
'I am putting pants on my son.'

The verb *d͡ʒɔjɐk* 'to read' undergoes the second set of argument structure effects. In a basic transitive construction (587), *d͡ʒɔjɐk* has an agent:SUBJ and a theme:DO.[131] When the causative suffix *-ʊv* is added to the verb in (588), a new causer:SUBJ is introduced. The original theme:DO argument (*kitɔb* 'book') is unaffected, but the Causee *çɨ pʊtr=i* 'his son' takes Accusative rather than Dative marking. Therefore, sentence (588) is an example of a double-object construction with the argument structure causer:SUBJ, theme:T-OBJ, and causee:R-OBJ.[132] I

[131] The agent:SUBJ in (585) is expressed via the subject-indexing enclitic *=əm* '1SG'.

[132] See §1.6.2 for a discussion and definitions related to double-object constructions.

analyze *kitɔb* ‘book’ as the T-OBJ because its semantic role (Theme) is the same in both the transitive and causative constructions. This analysis by default leaves the grammatical relation of R-OBJ for the Causee *çɨ pʊtr=i* ‘his son’, even though it resembles a Recipient only in animacy (it otherwise retains some agency and volition, neither of which are characteristics of Recipients).

(587) NP_{SUBJ} NP_{DO} <agt, th>
∅ [*kitɔb*] *=ɔm=ɔ̰ʂ* ***d͡ʒɔj-di.*** | |
∅ book=1SG=IPFV read-PST SUBJ DO
‘I read books.’ (24.14)

(588) NP_{SUBJ} $NP_{R\text{-}OBJ}$ $NP_{T\text{-}OBJ}$ <csr, cse, th>
[*ɐ=tɐt̪*] *=ɔ̰ʂ* [*çɨ pʊtr=i*] [*kitɔb*] ***d͡ʒɔj-ʊv-d.*** | | |
EMPH=father=IPFV self.GEN son=ACC book read-CAUS-3SG SUBJ R-OBJ T-OBJ
‘That father is making his son read a book.’

In this section, I have introduced the Afghan Wakhi causative morpheme *-ʊv ~ -ɔv*. In terms of typology, this morpheme is what Nichols *et al.* (2004: 159) refer to as an augmenting strategy; that is, a strategy that formally derives a transitive predicate from an intransitive one.

The Afghan Wakhi causative morpheme can be used to derive transitive verbs from intransitive ones. With this increase in valence, the original subject of the intransitive predicate maps to direct object regardless of its semantic role, and a new Agent or Stimulus maps to subject. At this point, only two transitive verbs are known to felicitously take the causative suffix. The increase in valence affects the argument structures of these two verbs in different ways: the causative of *pʊmt͡sɐk* ‘to put on (clothing)’ uses an indirective pattern (the Causee receives Dative marking), but the causative of *d͡ʒɔjɐk* ‘to read’ uses a double-object construction (the Causee and Theme receive identical marking to the direct object of a transitive clause). From the two examples currently available, it appears that the difference between Dative and Accusative marking on a Causee marking may correlate with a lesser or greater amount of control (respectively) retained by the Causee (cf. Comrie 1989: 174). If future work uncovers

additional transitive verbs that can take the morphological causative, it will be interesting to observe which verbs follow which pattern (or if any verbs can alternate between the two patterns) and to analyze the implications of the groupings.

7.1.2 Periphrastic Causatives

As discussed in Chapter 6, Afghan Wakhi (like other languages in the Iranian family) is rich in light verb constructions (LVCs). From this abundant inventory, I have identified two specific LVCs thus far that serve as dedicated periphrastic (i.e., analytical) causative constructions: *mɐd͡ʒbur t͡sərɐk* (lit., 'to forced do') and *zur t͡sərɐk* (lit., 'to strength do') (cf. §6.4.1.2). In my experience, these periphrastic constructions, particularly the one with *mɐd͡ʒbur t͡sərɐk*, are very common in conversation in Afghan Wakhi. However, they are not very common in narratives—there is only one example in my corpus of naturalistic speech, and that example is a passivized version of a *mɐd͡ʒbur t͡sərɐk* clause (cf. example (619) in §7.3.4). Therefore, all of the examples in this section are elicited.

During the elicitation process, I discovered that trying to elicit a 2SG or 3SG Causee often prompted speakers to produce an imperative clause as the complement of *mɐd͡ʒbur t͡sərɐk* ('Your father forced you [saying] that, "You go to the animals'; 'The mother forced her daughter [saying] that, "You milk the flock"). For whatever reason, this was not an issue when eliciting a 1SG Causee. Therefore, the examples in this section currently all feature 1SG Causees. I hope to remedy this limited distribution in future elicitation sessions.

Both periphrastic causative constructions of Afghan Wakhi follow the cross-linguistically observed pattern of introducing the causer:SUBJ and causee:DO as arguments of a causative main clause (cf. Comrie 1989: 175; Payne 1997: 185–186). The caused-event clause is a finite postverbal complement clause with a nonpast verb inflected for subject indexation. As a finite

clause, the predicate of the caused-event clause has the same argument structure as it would when it occurs in a main clause, as I show in the following discussion.

In the first periphrastic causative construction, the adjective *mɐd͡ʒbur* 'forced' functions as the PV of the LV *t͡sərɐk* 'to do'. A sample basic transitive clause is given in (589) for comparison to the corresponding causative construction in (590), which uses *mɐd͡ʒbur*. Example (590) is biclausal, with the caused event expressed via a finite complement clause in the active voice. The introduced NP *zɻ nɐn* 'my mother' is the causer:SUBJ of the causative clause, and the Causee is the direct object, as evidenced by the change in both syntactic position and case marking (*mɐzɻ=i* '1SG=ACC'). The Causee is coreferential with the agent:SUBJ (*wuz* '1SG.NOM') of the caused-event clause.

(589) NP_{SUBJ} NP_{DO} <agt, pat>
[*wuz*] [*çɨ mɔl=v=i*] *ðit͡s-əm.* | |
1SG.NOM self.GEN livestock=PL.OBL=ACC milk-3SG SUBJ DO
'I milk my livestock.'

(590) NP_{SUBJ} NP_{DO} <csr, cse_i>
[*zɻ nɐn*] [*mɐzɻ=i*] ***mɐd͡ʒbur t͡sɐr-t*** | |
1SG.GEN mother $1SG{=}ACC_i$ forced do-3SG SUBJ DO

NP_{SUBJ} NP_{DO} <agt_i, pat>
ki [*wuz*] [*çɨ mɔl=v=i*] *ðit͡s-əm.* | |
COMP $1SG.NOM_i$ self.GEN livestock=PL.OBL=ACC milk-1SG SUBJ DO
'My mother forces me to milk our livestock.'

The *mɐd͡ʒbur t͡sərɐk* construction is used to causativize all types of predicates, including not just transitive verbs, as in (590), but also intransitive verbs (591), ditransitive verbs (592), and LVCs (593). Like (590), each of these constructions is biclausal, with a causative main clause and caused event complement clause. Each causative clause has a causer:SUBJ and causee:DO; in each case, the Causee argument of the caused clause is coreferential with the Agent argument of the caused-event clause, regardless of the valence of the caused event clause.

The caused intransitive clause (591) has an agent:SUBJ argument; the caused ditransitive clause (592) has an agent:SUBJ, recipient:IO, and theme:DO, and the caused intransitive LVC (593) has a single agent:SUBJ. These examples show that a caused-event clause has the same valence and argument structure as a corresponding main clause with the same predicate.

(591) NP_{SUBJ} NP_{DO} <csr, cse_i>
[*zɻi vrʊt*] [*mɐzˌ*] ***mɐd͡ʒbur kər-ti*** | |
1SG.GEN brother 1SG forced do-PST SUBJ DO

NP_{SUBJ} <agt_i>
ki [*wuz*] *tər mɔl rʊʈ͡ʂ-əm.* |
COMP 1SG.NOM over.to livestock go-1SG SUBJ
'My brother forced me to go over to the livestock.'
(lit., 'that I over to the livestock go')

(592) NP_{SUBJ} NP_{DO} <csr, cse_i>
[*mɐlim*] [*mɐzˌ*] ***mɐd͡ʒbur t͡sɐr-t*** | |
teacher 1SG forced do-1SG SUBJ DO

NP_{SUBJ} NP_{IO} NP_{DO} <agt_i, rec, th>
ki [*wuz*] [*çɻ ɐnɖiwɔl=ər*] [*kitɔb*] *disʊv-əm.* | | |
COMP 1SG.NOM self.GEN friend=DAT book show-1SG SUBJ IO DO
'The teacher is forcing me to show my friend the book.'
(lit., 'that I to self's friend the book show')

(593) NP_{SUBJ} NP_{DO} <csr, cse_i>
[*tɐw*] [*mɐzˌ*] ***mɐd͡ʒbur kər-ti*** | |
2SG 1SG forced do-PST SUBJ DO

NP_{SUBJ} <agt_i>
ki [*wuz*] *də tuj bɐjt çɐn-əm.* |
COMP 1SG.NOM LOC wedding song say-1SG SUBJ
'You forced me to sing at the wedding.'
(lit., 'that I at the wedding song say')

Examples (590) – (593) all contain an explicit 1SG subject pronoun in the caused-event clause. The use of an explicit subject in a caused-event clause is not unique to 1SG subjects, but is consistent with subjects of other persons, as illustrated by (594).

(594) NP_{SUBJ} NP_{DO}
[*wuz*] [*çɨ* *pʊtr=ɨ*] ***mɐd͡ʒbur*** ***t͡sɐr-əm***
1SG.NOM self.GEN son=ACC forced do-1SG

NP_{SUBJ} NP_{DO}
ki [*ɐw*] [*mɔl*] *pɨj-d.*
COMP 3SG.DIST livestock graze-3SG
'I force my son to graze the livestock.'

The second causative LVC in Afghan Wakhi is *zur t͡sərɐk*, which literally translates as 'strength do'. Like *mɐd͡ʒbur t͡sərɐk*, this LVC also introduces a biclausal causative construction in which the main clause is the causative clause and the complement clause is the caused-event clause. The causative clause takes a causer:SUBJ and causee:DO; the causee:DO is coreferential with the subject of the caused-event clause. Also like *mɐd͡ʒbur t͡sərɐk*, the *zur t͡sərɐk* construction may be used to causativize any clause, regardless of its valence or predicate type (i.e., lexical verb or LVC). In my experience, *zur t͡sərɐk* is significantly less frequent than *mɐd͡ʒbur t͡sərɐk*.

The caused event clause of a *zur t͡sərɐk* causative construction exhibits the same valence and argument structure as a corresponding main clause. Sentences (595) – (597) provide examples of *zur t͡sərɐk* constructions used to causativize an intransitive verb, a ditransitive verb, and an intransitive LVC, respectively. I also found eliciting examples with *zur t͡sərɐk* to be extremely difficult because one of my consultants only interpreted *zur t͡sərɐk* as an LVC meaning 'to pull', even though he spontaneously produced it as a causative another time without any prompting from me.

(595) NP_{SUBJ} NP_{DO} <csr, cse_i>

[*zɻ* *tɐt*] [*mɐzᵢ*] ***zur*** ***kər-ti*** | |

1SG.GEN father 1SG strength do-PST SUBJ DO

NP_{SUBJ} <agt_i>

ki [*wuz*] *rʊʧ͡ʂ-əm* *məl* *ʂkurg-ɐk.* |

COMP 1SG.NOM go-1SG livestock search-INF SUBJ

'My father made me go to search for the livestock.'

(lit., 'that I go to search the livestock')

(596) NP_{SUBJ} NP_{DO} <csr, cse_i>

[*zɻ* *tɐt*] [*mɐzᵢ*] ***zur*** ***kər-ti*** | |

1SG.GEN father 1SG strength do-PST SUBJ DO

NP_{SUBJ} NP_{DO} NP_{IO} <agt_i, rec, th>

ki [*wuz*] [*ji* *məʃin*] [*çɨ* *çɨj=ər*] *dərz-əm.* | | |

COMP 1SG.NOM one machine self.GEN sister=DAT take-1SG SUBJ IO DO

'My father made me get a sewing machine for my sister.'

(lit., 'that I a machine for my sister take.')

(597) NP_{SUBJ} NP_{DO} <csr, cse_i>

[*zɻ* *ɐnɖiwəl*] [*mɐzᵢ*] ***zur*** ***kər-ti*** | |

1SG.GEN friend 1SG strength do-PST SUBJ DO

NP_{SUBJ} <agt_i>

ki [*wuz*] *rʊqɔs-iɟ* *ʦɐr-əm.* |

COMP 1SG.NOM dancer-NMLZ do-1SG SUBJ

'My friend made me dance.'

(lit., 'that I dancing do')

As I have described in this section, Afghan Wakhi has two periphrastic causative strategies that involve LVCs. Both of these strategies code the Causee as an Accusative-marked direct object in the main clause, and both may be used to increase the valence of any type of predicate. Typology suggests that Accusative marking on a Causee indicates a low degree of agency or control on the part of the Causee (Comrie 1989: 181–182); however, further research is needed to determine if this generalization holds for Afghan Wakhi.

Another area of typological interest relevant to the study of causatives is the correlation between different formal causative strategies on the one hand, and indirect vs. direct causation on

the other. Shibatani & Pardeshi (2002: 89) define DIRECT CAUSATION as "a situation involving an agentive causer and a patientive causee," and INDIRECT CAUSATION as one "involving two agentive participants, one an agentive causer and the other an agentive causee." Cross-linguistically, causative constructions that have fewer and more tightly-bound components, such as lexical and morphological causatives, tend to correlate with direct causation. In contrast, causative constructions that are more "bulky," such as analytic and periphrastic causatives, tend to correlate with indirect causation (Comrie 1989: 172–173; Shibatani & Pardeshi 2002: 109–110; Velupillai 2012: 262). However, as Shibatani & Pardeshi (2002: 110) observe, it is important to remember that these tendencies are not linguistic universals and that "even within a single language, the suggested correlations may not hold."

Where Afghan Wakhi causatives are concerned, the issue of direct vs. indirect causation is somewhat complicated. Typology suggests that a morphological causative should be on the direct end of the causative spectrum. In Afghan Wakhi, some morphologically derived causative verbs (cf. Table 7.1) do seem to express direct causation because they take an Agent and either a Patient or Theme. However, others (in fact, more) appear to express indirect causation given that they take a Causer and an agentive Causee. In both periphrastic causative constructions, the Causee of the main (causing) clause is clearly agentive since it is coreferential with the Agent of the caused-event clause; therefore, periphrastic causatives in Afghan Wakhi do seem consistent with the typology of indirect causation. Further research, including more examples of causatives with a wider variety of verbs, is needed to better understand this issue.

7.2. Passive Constructions

Having described the causative strategies of Afghan Wakhi in §7.1, I next shift my focus to valency-decreasing constructions, i.e., passive constructions. Functionally speaking, a PASSIVE

is a construction that serves to detopicalize the Agent in favor of a non-Agent participant, such as a Patient, Theme, or Recipient. As a result of these pragmatic changes, passives also typically serve to reduce the valency of a predicate by "demoting" or suppressing the Agent (Givón 2001b: 93–94; Abraham 2006: 2). Structurally speaking, the subject of the active clause is either coded as an optional oblique or omitted altogether in a passive construction, while the active direct object (or another non-subject grammatical relation, depending on the language) is coded as the passive subject (Dixon & Aikhenvald 2000: 6).[133]

According to Bashir (2009: 833), Wakhi lacks voice-changing morphology and therefore does not make any voice distinctions.[134] It is true that Wakhi does not have a dedicated passive morpheme, as Bashir observes. However, it does have an analytic passive construction that comprises a perfect participle followed by an inflected form of *wɔt͡sɐk* 'to become', which in this construction functions as a passive auxiliary. This type of participle-plus-auxiliary construction is a common passive strategy in Indo-European languages, as is the use of a 'become' verb as an auxiliary in such constructions (Abraham 2006: 2; Siewierska 1984: 126).

Examples (598) and (599) illustrate the difference between the active and passive voice constructions for the verb *dərzɐk* 'to take'. In the active voice, *dərzɐk* is bivalent: it takes an agent:SUBJ and a theme:DO, which in (598) are both overtly expressed. The verb itself is in the nonpast and as such is inflected to index the syntactic subject. However, in (599), the Theme is coded as the subject, and the Agent is not expressed at all; i.e., the verb is monovalent. In this

[133] Givón refers to this type of passive, in which a non-agent argument becomes the subject of the clause, as a "promotional" passive; he uses "non-promotional" to refer to passive constructions in which the most topical argument does not become the syntactic subject (2001b: 94).

[134] Bashir does mention a construction that uses 3PL subject indexation to obscure the agent (2009: 833). The only example she provides is *yark-ep tsar-en* 'the work will be done' (lit., 'they will do the work'). Since this construction strongly resembles ones that other linguists have called impersonal passives, it seems inconsistent with her statement regarding the lack of voice oppositions in Wakhi.

passive construction, the main verb *dərzɐk* is in the perfect and is accompanied by the past form of the auxiliary *wɔt͡sɐk* 'to become'.[135]

(598) NP_{SUBJ} NP_{DO} <agt, th>
ʊt bilɔxirɐ, [*jəm kɐ̨ʂ*] [*əm mɔl=v=i*] ***dərz-d.*** | |
and finally PROX boy 3SG.PROX livestock=PL.OBL=ACC take-3SG SUBJ DO
'And finally, this boy takes his [the ogre's] livestock.' (25.154)

(599) *jɐ=pɐ̨jsɐ=ən=ʊt t͡sʊ çɐt-i, ʊstɔd,*
DIST=money=ABL=2SG FACT say-PST teacher

NP_{SUBJ} <agt, th>
[*jɐw*] *dr=əm* ***dəz̨-g*** ***nʊ=vit-i.*** | |
3SG.DIST at=PROX take-PRS NEG=become-PST ∅ SUBJ
'Regarding that money you mentioned, teacher,
it was not received here.' (lit., 'was not taken') (p.c. 4/1/2026)

The tense of the auxiliary determines the tense of the entire passive construction. For example, the auxiliary in (599) is in the past, with the result that the entire clause is interpreted as being in the past tense. In contrast, the auxiliary in (600) is in the nonpast, which in context serves as a gnomic present.

(600) NP_{SUBJ} <agt, pat>
də tuj [*guʂt*] ***jit-k*** ***wɔst.*** | |
LOC wedding meat eat-PRS become-3SG ∅ SUBJ
'Meat is eaten at weddings.'

It is important to distinguish passive constructions from stative nonverbal clause constructions. Sentence (601) gives an example using the verb *ʂkəndɐk* 'to break'. In this example, there is no auxiliary, and the perfect participle functions not as a verb, but as an AP predicate in a property-concept nonverbal predicate construction (cf. §5.2.2.2).

[135] Recall from §4.5.1.1 that a perfect verb wordform comprises a perfect stem that is inflected via the present perfect suffix *-k ~ -g* 'PRS'.

(601) NP_{SUBJ} <th>
[*jəm ruj*] = *əʂ* *ki* ***ʂkən-g.*** |
3SG.PROX face=IPFV all break-PRS SUBJ
'His face is all torn up (lit., broken).' (Wolf Attack 16)

All of the passive examples given thus far lack an explicit Agent phrase, although an Agent is still part of the semantics of a passive predicate (as I indicate in my argument structure diagrams). In thirteen years of interacting with the Afghan Wakhi, I have encountered only a single passive construction in spontaneous natural speech that includes an oblique Agent (602). Even in targeted elicitation, I have been able to acquire only a single example of an oblique Agent included in a passive construction (603). All other attempts to add an oblique Agent to a passive construction have been rejected by native speakers. It is certainly possible that there are other verbs that can take an oblique Agent in the passive. However, in general it seems that the Afghan Wakhi passive construction is the kind of passive referred to in the literature as an "agentless passive" (cf. Dixon & Aikhenvald 2000: 7; Givón 2001a: 35) or a "basic passive" (Keenan & Dryer 2007: 328–329).

(602) NP_{SUBJ} NP_{OBL} <th, agt>
[*ji fɐrmən*] [*nɐd͡ʒib* = *ən*] ***sɔdir vit-i*** *ki . . .* | |
one command Najib=ABL issue become-PST COMP SUBJ (OBL)
'A command was issued from Najib that . . .' (TEX-0023.023)

(603) NP_{SUBJ} PP_{OBL} <th, agt>
ɐ = [*jəm gɐp*] (***t͡sʊ fɐjz ɐli* = *ən***) | |
EMPH=PROX chat from Faiz Ali=ABL SUBJ (OBL)

də d͡ʒʊlsɐ çən-ʊt-k vit-k.
LOC meeting say-PRF-PRS become-PRS
'This matter was said by Faiz Ali at the meeting.'

As I have shown in this section, Afghan Wakhi uses an analytic construction to decrease the syntactic valence of a predicate. The argument structure of the passive construction only marginally includes an oblique Agent; the vast majority of the time, an oblique Agent phrase is

deemed infelicitous by native speakers. It can be difficult at times to distinguish a passive construction from some other construction, given (a) that perfect participles can also function as APs in nonverbal predicate constructions, and (b) that the verb *wɔt͡sɐk* ‘to become’ has several other functions in addition to its passive auxiliary functions (for example, it serves as an inchoative copula (§5.1.2) and an LV (§6.4.5)). As an LV, *wɔt͡sɐk* participates in valence alternations with several other LVs. Patterns associated with LV alternations and valence are the topic of the next section.

7.3. LV Alternations and Valency

Recall from §6.1 that light verbs are not completely bleached of meaning; rather, the choice of LV often has associated semantic effects on the predicate as a whole, including effects on voice, valency, and argument structure. In Afghan Wakhi, a number of PVs participate in LV alternations that change the valence of the entire construction. For example, consider two LVCs that share the PV *d͡ʐuʂ* ‘boiling’. When *d͡ʐuʂ* collocates with the LV *wəzɐjən* ‘to come’ (604), the resulting LVC is inchoative with a single patient:SUBJ argument; an Agent is not part of its semantic frame. However, when *d͡ʐuʂ* instead collocates with *rədɔwən* ‘to give’ (605), the resulting LVC is transitive and takes an agent:SUBJ and a patient:DO. Both LVCs express essentially the same predicative concept of “boiling,” but they have different argument structures and thus belong to different valency classes.

(604) NP_{SUBJ} <pat>
[*jupk*] *ɣɐl* ***d͡ʐuʂ*** *nʊ = **wəz-g** = ɐ?* |
water yet boiling NEG=come-PRS=Q SUBJ
‘Hasn’t the water boiled [lit., ‘boiling come’] yet?’ (L2 knowledge)

(605) NP_{SUBJ} NP_{DO} <agt, pat>
∅ [*t͡ʃɔʃ*] ***d͡ʐuʂ*** ***rɐnd-ən***. | |
∅ tea boiling give-1PL SUBJ DO
‘We boil [lit., ‘boiling give’] tea.’ (Housework 2)

The remainder of this section is concerned with alternations of the type seen in (604) and (605). Neither option in this type of alternating pair is any more or less basic than the other: both are equally derived by changing the LV collocated with the PV. Therefore, valence-associated LV alternations cannot be described as either valence-increasing or valence-decreasing, but instead as an equipollent type of alternation (cf. Haspelmath 1993: 91; Shibatani 2002: 3). Some LVs form regular valence alternation patterns with groups of PVs, while other alternations are idiosyncratic to a specific PV. I describe several patterns of LV alternations associated with valency in §7.3.1 – §7.3.4, and I address idiosyncratic alternations in §7.3.5.

7.3.1 Alternations with *rədɔwən* 'to give'

Several PVs in Afghan Wakhi can collocate with both *rədɔwən* 'to give'[136] and another LV. For this group of LVCs, *rədɔwən* occurs in a transitive or ditransitive frame, while the other LV occurs in an intransitive one. Thus far, there are no discernable patterns among the LVs that alternate with *rədɔwən*. The use of *rədɔwən* usually requires an agent:SUBJ argument, as seen in the pair of examples given in (606) and (607). Sentence (606) provides an example of the intransitive LVC *dɐrs d͡ʒɔjɐk* 'to study' (lit., 'to lesson read'), which has a single agent:SUBJ argument.[137] However, when *dɐrs* collocates with *rədɔwən* (607), the argument structure includes a new agent:SUBJ, a theme:DO, and a recipient:IO that corresponds to the agent:SUBJ of the intransitive LVC.

(606) NP_{SUBJ} <agt>
[*ti* *pʊtr=əʂ*] ***dɐrs*** ***nʊ=d͡ʒɔj-d.*** |
2SG.GEN son=IPFV lesson NEG=read-3SG SUBJ
'Your son doesn't study [lit., 'does not lesson read'].' (01.01)

[136] Nonpast stem: *rɐnd*; past or perfect stem: *rʊt*.

[137] This LVC is an example of the kind of predicate that Nichols *et al.* (2004: 159) refer to as "ambitransitive," meaning the same predicate can be either intransitive or transitive without undergoing any kind of formal derivation.

(607) NP_{SUBJ} NP_{IO} NP_{DO} <agt, rec, th>
[*jɐ mɐlim*] [*tɐr*] *wudg* [*t͡ʃiz*] ***dɐrs*** ***rʊt-i****?* | | |
DIST teacher 2SG.DAT today what lesson give-PST SUBJ (IO) DO
'What did the teacher teach [lit., 'lesson give'] you today?' (01.22)

The LV *rədɔwən* 'to give' usually takes an agent:SUBJ argument, as seen above. However, when it collocates with the PV ***t͡sʊ dɐstən*** 'from hand', it instead takes a non-volitional source:SUBJ that is negatively affected by the malefactive semantics of the predicate (608). The LV *jundɐk* 'to carry' is the alternate required to express an agent:SUBJ with this PV (609). The PV ***t͡sʊ dɐstən*** can also collocate with the LV *rʊʈ͡ʂɐk* 'to go', in which case the predicate is intransitive with a theme:SUBJ (610). In both the *jundɐk* and *rʊʈ͡ʂɐk* LVCs, a negatively affected Source argument is coded as an adnominal possessor (NP_{POSS}) inside the PV, but there is no such possessor in the PV of the *rədɔwən* construction. I suspect that the only possible adnominal possessor in (608) would be the Genitive reflexive pronoun *çi* (cf. §3.3.3), but without an explicit example, I cannot say for sure. The LVCs from my corpus that are involved in valency alternations with *rədɔwən* can be seen in Table 7.2.

(608) NP_{SUBJ} NP_{DO} <src, th>
[*sɐk*] *=ən* [*dɐftɐr=i*] ***t͡sʊ dɐst=ən*** ***rʊt-i****.* | |
1PL.NOM=1PL office=ACC from hand=ABL give-PST SUBJ DO
'We lost the office.'
(lit., 'We the office from hand gave.')

(609) NP_{SUBJ} NP_{DO} NP_{POSS} <agt, th, src>
[*gʊl mɐmɐd*] *ɐ=*[*ɟɨw=i*] ***t͡sʊ*** [***ʐɨ***] ***dɐst=ən*** ***jut-i****.* | | |
Gul Mohammad EMPH=cow=ACC from 1SG.GEN hand=ABL carry-PST SUBJ DO NP_{POSS}
'Gul Mohammad took that cow from me.'
(lit., 'Gul Mohammad that cow from my hand carried.')

(610) NP_{SUBJ} NP_{POSS} <th, src>
[*ɐw*] ***t͡sʊ*** [***ʐɨ***] ***dɐst=ən*** ***rʊʂt****.* | |
3SG.DIST from 1SG.GEN hand=ABL go.3SG SUBJ NP_{POSS}
'It is being lost.' (lit., 'from my hand is going')

Table 7.2. Alternations with the LV *rədɔwən* ‘to give’

PV	LV	LVC Meaning	Argument Structure
dɐrs ‘lesson’	*d͡ʒɔjak* ‘read’	‘to study’	<agt>
	rədɔwən ‘give’	‘to teach’	<agt, th, rec>
səbɐq ‘lesson’	*dərzɐk* ‘take’	‘to learn’	<agt>
	rədɔwən ‘give’	‘to teach’	<agt, th>
d͡ʐuʂ ‘boiling’	*wəzɐjən* ‘come’	‘to boil (ITR)’	<pat>
	rədɔwən ‘give’	‘to boil (TR)’	<agt, pat>
d͡ʒizɔ ‘punishment’	*winɐk* ‘see’	‘to get punished’	<pat>
	rədɔwən ‘give’	‘to punish’	<agt, pat>
t͡sʊ dɐstən ‘from hand’	*rədɔwən* ‘give’	‘to give up / lose involuntarily’	<src, th>
	jundɐk ‘carry’	‘to seize’	<agt, th, src [NP_{POSS}]>
	rʊt͡ʂɐk ‘go’	‘to get lost’	<th, src [NP_{POSS}]>

7.3.2 Alternations with *t͡sərɐk* ‘to do’

The second LV involved in alternations that affect the valence of the predicate is *t͡sərɐk* ‘to do’. In my corpus, I have identified two LVs involved in this kind of alternation with *t͡sərɐk*; these are displayed in Table 7.3.

Table 7.3. Alterations with the LV *t͡sərɐk* ‘to do’

PV	LV	LVC Meaning	Argument Structure
jʊçk ‘learning’	*wɔt͡sɐk* ‘become’	‘to learn’	<exp>
	t͡sərɐk ‘do’	‘to educate, raise’	<agt, pat>
sʊrx ‘red’	*wəzɐjən* ‘come’	‘to get hot’	<pat>
	t͡sərɐk ‘do’	‘to heat X up, to fry X’	<agt, pat>

A pair of LVCs differentiated by the use of *t͡sərɐk* can be seen in (611) and (612). In (611), the LVC *sʊrx wəzɐjən* ‘to get hot’ (lit., ‘to red come’) is intransitive and inchoative. It takes a single patient:SUBJ, but an Agent is not part of its semantic frame. In contrast, the corresponding LVC with *t͡sərɐk* (612) is transitive and takes an agent:SUBJ and a patient:DO.

(611) NP_{SUBJ} <pat>

∅ *xub* ***sʊrx*** ***wəz-di,*** |

∅ good red come-PST SUBJ

kɐr-t=əm *sk=ɐ* *guṣt.*

put-PST=1SG on=3SG.DIST meat

'It [the fire] got good and hot [lit., 'red came'],

(and) I put meat on it.' (Hunting 55)

(612) NP_{SUBJ} NP_{DO} <agt, pat>

jɐn ∅ [*jəm=v=i*] ***sʊrx*** ***t͡sɐr-ən.*** | |

then ∅ 3.PROX=PL.OBL=ACC red do-1PL SUBJ DO

'Then we heat them up [lit., 'red do.']. (TEX-0059.10)

7.3.3 Alternations between *çɐk* 'to make' and *t͡sərɐk* 'to do'

The LVs *çɐk* 'to make' and *t͡sərɐk* 'to do' may alternate with each other when the collocated PV is an NP or AP that expresses an emotion, regardless of whether that emotion is voluntary or involuntary. For these predicates, using *çɐk* vs. *t͡sərɐk* results in a causative-inchoative alternation, respectively. Sentences (613) and (614) illustrate this alternation with the PV *qɐr* 'angry'. In (613), *qɐr* is collocated with the LV *çɐk* 'to make'; the result is a syntactically transitive, causative predicate with a stimulus:SUBJ and an experiencer:DO argument. However, when *qɐr* is correlated with the LV *t͡sɐr-t* 'do-3SG' as in (614), the resulting predicate is intransitive and inchoative. No Stimulus or Causer argument is included in the semantic frame of this inchoative LVC, and its only possible argument is an experiencer:SUBJ.

(613) NP_{SUBJ} NP_{DO} <stim, exp>

[*tɐw*] [*mɐz̨*] ***qɐr*** ***gɔç-ti.*** | |

2SG 1SG anger make-PST SUBJ OBJ

'You made me angry.'

(614) NP_{SUBJ} <agt>

[*t͡ʃilgɐzmɐk* *t͡ʃilgɐzmɨj*] ***qɐr*** ***t͡sɐr-t.*** |

forty.meter.neck forty.meter.hair anger do-3SG SUBJ

'The forty-meter-necked, forty-meter-haired lady gets angry.' (25.406)

Thus far, I have only three examples of possible causative-inchoative alternations associated with LVCs that use *çɐk* 'to make' vs. *t͡sərɐk* 'to do'; however, I expect to find other emotion and / or experiencer predicates that exhibit similar alternations. The examples found in my current corpus are given in Table 7.4. The causative (*çɐk* 'to make') LVCs are displayed in the LVC 1 column, and the corresponding inchoative (*t͡sərɐk* 'to do') LVCs are displayed in the LVC 2 column.

Table 7.4. Alternations associated with *çɐk* 'to make' vs. *t͡sərɐk* 'to do'

PV & Effect	LVC 1	'to make'	LVC 2	'to do'
ADJ inchoative-transitive	*qɐr çɐk*	'to anger X'	*qɐr t͡sərɐk*	'to get angry'
	xfɐ çɐk	'to make X upset'	*xfɐ t͡sərɐk*	'to get upset'
	xʊʃ çɐk	'to make X happy'	*xʊʃ t͡sərɐk*	'to like'[138]

7.3.4 Alternations with *wɔt͡sɐk* 'to become'

For a number of PVs, the LV *wɔt͡sɐk* 'to become' systematically alternates with either *t͡sərɐk* 'to do' or *çɐk* 'to make'. For both pairs of alternations, the LVC that uses *t͡sərɐk* or *çɐk* is an active, transitive predicate, while the LVC that uses *wɔt͡sɐk* is intransitive.

When *wɔt͡sɐk* 'to become' alternates with *t͡sərɐk* 'to do', the voice of the LVC formed with *wɔt͡sɐk* is directly correlated to the word class of the PV involved in the alternation. With a nominal NP as the PV, alternations between the LVs *t͡sərɐk* and *wɔt͡sɐk* form active vs. passive clauses, as seen in (615) and (616), respectively. In both of these sentences, the PV is the noun *isɔb* 'accounting'. When this PV collocates with the LV *t͡sərɐk* 'to do' (615), the result is an active, transitive predicate that takes an agent:SUBJ and a theme:DO. However, when it collocates

[138] The LVC *xʊʃ t͡sərɐk* (lit., 'to happy do') means 'to like', not 'to be happy', as one might expect. To express the state of happiness, one uses a nonverbal clause construction such as *wuz xʊʃ=əm* (lit., 'I happy=1SG'). To express entering the state of happiness, one uses *wɔt͡sɐk* 'to become', e.g., *xʊʃ=əm vit-k* (lit., 'happy=1SG become-PRS').

with *wɔt͡sɐk* ‘to become’ in (616), the resulting predicate is passive and syntactically takes only a theme:SUBJ argument; the semantic Agent argument is not expressed.

(615) *tu* *ɐr* *təkɐ* *ki* *dərz,*
2SG.NOM every mouthful COMP take.2SG

[*jɐw*] [*ɐw=i*] ***isɔb*** ***t͡sɐr-t.*** <agt, th>
3SG.DIST 3SG.DIST=ACC accounting do-3SG | |
‘Every mouthful that you eat, he counts it.’ SUBJ DO
(lit., ‘he accounting does it’) (Prov. 23:7)

(616) *xʊj,* *ʃurɔ=ʃ=i* *ki* *wɔz,*
INTJ council=PL.DFLT=SPEC COMP then
P_{SUBJ} <agt, th>
[*truj* *t͡səbɨr*] *ji* *ʃurɔ* ***isɔb*** ***t͡sʊ*** ***wɔst*** . . . | |
three four one council accounting FACT become.3SG ∅ SUBJ
‘Well, village councils that then, three or four
are counted [lit., ‘accounting become’] as one village council . . .’ (TEX-0306-1.03)

When the LVs *t͡sərɐk* ‘to do’ and *wɔt͡sɐk* ‘to become’ alternate in conjunction with an AP as the PV, the resulting LVCs exhibit a causative-inchoative alternation. This pattern is illustrated by a pair of examples with the PV *d͡ʒɐm* ‘gathered’. When *d͡ʒɐm* collocates with *t͡sərɐk*, the LVC as a whole is active and causative, and it takes an agent:SUBJ and a theme:DO (617). By comparison, when *d͡ʒɐm* collocates with *wɔt͡sɐk* (618), the resulting LVC is an inchoative predicate that takes only a single agent~theme:SUBJ argument.

(617) NP_{SUBJ} NP_{DO} <agt, th>
[*əm*] [*tɐmɔm=i* *mərdʊm=v=i*] ***d͡ʒɐm*** ***t͡sɐr-t.*** | |
3SG.PROX all=EZ people=PL.OBL=ACC gathered do-3SG SUBJ DO
‘He gathers all the people together.’ (25.015)

(618) NP_{SUBJ} <agt~th>
jɐkdɐm [*əm* *ʃəɣɔl=əʃ* *kɨ*] ***d͡ʒɐm*** ***wɔt͡s-ən.*** |
at.once PROX jackal=PL.DFLT all gathered become-3PL SUBJ
‘At once the jackals all gather.’ (25.252)

As an LVC with an AP as its PV, the periphrastic causative construction *mɐd͡ʒbur t͡səɾak* ‘to force’ (lit., ‘to forced do’) (cf. §7.1.2) can also be passivized via alteration with *wɔt͡sɐk* (619). As a result of this alternation in LV, the argument structure of the main clause no longer includes a causer:SUBJ argument. Instead, the Causee argument is the syntactic subject of the clause, as is evident from the subject-indexing clitic *=əm* ‘1SG’ attached to *mɐd͡ʒbur*. Identical subject indexation in the caused-event clause shows that the agent:SUBJ of that clause is coreferential with the causee:SUBJ of the main clause; the theme:DO (flesh from the boy’s own arm) is not expressed but is recoverable from the narrative context.

(619)

NP_{SUBJ}				<cse_i>
xʊj,	∅	***mɐd͡ʒbur=əm***	***vit-i,***	|
INTJ	$∅_i$	forced=1SG	become-PST	SUBJ

NP_{SUBJ}	NP_{DO}		NP_{IO}	<agt_i, rec, th>
∅	∅	*rʊt=əm*	*tɐr.*	| | |
$∅_i$	∅	give.PST=1SG	2SG.DAT	SUBJ IO DO

‘I was forced to give it to you.’)
(lit., ‘I_i became forced (and) gave (it) to you.’) (25.349)

The LV *çɐk* ‘to make’ can also alternate with *wɔt͡sɐk* ‘to become’ when collocated with an AP functioning as PV. Although my corpus currently contains only one PV that undergoes this alternation (*psjupk* ‘drowned’), the LVC that this PV forms with *çɐk* and *wɔt͡sɐk* exhibit the same causative-inchoative alternation seen in the alternation between LVCs with *t͡səɾɐk* ‘to do’ and *wɔt͡sɐk* ‘to become’. Example (620) uses the LV *çɐk* ‘to make’ in conjunction with the PV *psjupk* ‘drowned’; the resulting LVC is an active, transitive predicate with an agent:SUBJ and a theme:DO. In contrast, when the same PV collocates with *wɔt͡sɐk* ‘to become’ in (621), the result is an inchoative predicate that has a single patient:SUBJ; an Agent is not part of this LVC’s semantic frame.

(620) NP_{SUBJ} NP_{DO} <agt, th>

∅ [*jəm qɨti=v=i*] ***psjupk*** ***gɔç-ən*** *d=əm* *dərjɔ.* | |

∅ PROX can=PL.OBL=ACC drowned make-3PL LOC=PROX river SUBJ DO

'Let's throw [lit., 'drowned make'] these cans in the river.'

(621) *ki* *wʊzm-ən=əʂ* *ɐw* *tɐt* *xun*

COMP bring-1PL=IPFV 3SG.DIST father house

jʊt *di* *dɐ* *skɔrd,*

MED hit LOC bridge

NP_{SUBJ} <pat>

∅ ***vit*** ***psjupk****.* |

∅ become.PST drowned SUBJ

'When we were bringing her to her father's house,
she tripped on the bridge (and) drowned [lit., 'became drowned'].' (TEX-0023.083)

Table 7.5 displays a summary of the valency-changing alternations associated with the LV *wɔt͡sɐk* 'to become' along with a few examples of LVCs that exhibit them. The transitive *t͡sərɐk* 'to do' or *çɐk* 'to make' version of the LVC is given in the LVC 1 column, while the corresponding intransitive *wɔt͡sɐk* version is given in the LVC 2 column. The top section of the table contains LVCs that take a nominal NP as PV, which alternate between active and passive voice. The lower section of the table displays the LVCs that take an AP as PV and that exhibit a causative-inchoative alternation.

Table 7.5 Voice alternations associated with *wɔt͡sɐk* ‘become’

PV & Effect	LVC 1		LVC 2	
N active-passive	*isɔb t͡sərɐk*	‘to count X’	*isɔb wɔt͡sɐk*	‘to be counted’
	nɔʐdɔn t͡sərɐk	‘to weed X’	*nɔʐdɔn wɔt͡sɐk*	‘to be weeded’
ADJ causative-inchoative	*d͡ʒɐm t͡sərɐk*	‘to gather X’	*d͡ʒɐm wɔt͡sɐk*	‘to gather’
	d͡ʒir t͡sərɐk	‘to build, make, fix, prepare X’	*d͡ʒir wɔt͡sɐk*	‘to heal’
	mɐd͡ʒbur t͡sərɐk	‘to force X to do Y’	*mɐd͡ʒbur wɔt͡sɐk*	‘to be forced to do Y
	pidɔ t͡sərɐk	‘to find X’	*pidɔ wɔt͡sɐk*	‘to appear’
	tir t͡sərɐk	‘to pass X’	*tir wɔt͡sɐk*	‘to pass by’
	ʊʈ t͡sərɐk	‘to open X’	*ʊʈ wɔt͡sɐk*	‘to open’
	wʊsk t͡sərɐk	‘to dry X’	*wʊsk wɔt͡sɐk*	‘to dry’
	xɐtm t͡sərɐk	‘to end X’	*xɐtm wɔt͡sɐk*	‘to end’
	xbɐr t͡sərɐk	‘to wake X’	*xbɐr wɔt͡sɐk*	‘to awaken’
	psjupk çɐk	‘to drown X’	*psjupk wɔt͡sɐk*	‘to drown’

7.3.5 Idiosyncratic LV Alternations

Although many LV alternations that affect the valence of an LVC are systematic, others are idiosyncratic to a particular PV. One example of an idiosyncratic LV alternation that affects valence can be seen in (622) and (623). The PP *t͡sʊ bʊjnən* ‘from the middle’ function as the PV in both examples. In the second clause of (622), this PV is collocated with the LV *rʊʈ͡ʂɐk* ‘to go’ to form an inchoative LVC meaning ‘to pass away’ (lit., ‘to go from the middle’). However, in (623), it is collocated with the LV *jundɐk* ‘to carry’, and the resulting LVC ‘to kill’ (lit., ‘to carry from the middle’) is transitive. The patient:SUBJ of the inchoative construction in (622) corresponds to the patient:DO of the transitive construction in (623), which also contains the NP *ɐ=mɐrizi* ‘the illness’ as its agent:SUBJ argument.

(622) *nɔziun pʊtr=əʃ kɨ ʃɐjid vit,*
favored son=PL.DFLT all martyr become.PST

NP_{SUBJ}	<pat>
∅ *t͡sʊ bʊjn=ən rəwj-di.*	|
∅ from middle=ABL go-PST	SUBJ

'The beloved sons both died, (they) passed away.'
(lit., 'became martyred, from the middle went') (25.619)

(623)

NP_{SUBJ}	NP_{DO}				<agt, pat>
ɐ=[*mɐriz-ɨ*]	[*ɐw*]	*t͡sʊ*	*bʊjn=ən*	*jut-i.*	| |
EMPH=ill-NMLZ	3SG.DIST	from	middle=ABL	carry-PST	SUBJ DO

'The illness killed him.' (lit., 'from the middle took him')

7.4. Summary

In this chapter, I have described a variety of constructions that can be used to change the valence of predicates in Afghan Wakhi. The inventory of valency-increasing constructions includes a morphological causative and two periphrastic causatives. There is only a single valency-decreasing construction, i.e., an analytic passive. In addition, a number of LV alternations can be used to create alternations in the valence of a specific LVC; these alternations are equipollent since neither the transitive nor the intransitive construction can be said to be derived from the other.

At this point, it is worth briefly discussing how the different types of predicates (lexical verbs and LVCs) of Afghan Wakhi fit into a typology of valency-changing patterns. For this purpose, I refer to the typology developed by Nichols *et al.* (2004). In their study, Nichols *et al.* survey the patterns and relationships between intransitive-transitive semantic pairs of 18 specific predicates in 80 languages. Based on their findings, they propose a typology comprising four "favored correspondences" (Nichols, Peterson & Barnes 2004: 161) between intransitive and transitive predicates: augmented, reduced, neutral, and indeterminate. The correspondence used for the majority of the 18 predicate pairs determines the language's favored correspondence.

"Augmenting" languages use valence-increasing morphology in a majority of cases; "reducing" languages on the other hand are those that rely heavily on valence-decreasing morphology. In "neutral" type languages, the majority of transitive and intransitive predicates are treated as equally derived, while in "indeterminate" languages, both types of predicates are treated as equally underived (Nichols, Peterson & Barnes 2004: 141, 146).

When I evaluated Afghan Wakhi for correspondences between the 18 verb pairs used by Nichols *et al*., I found three pairs that definitively use an augmenting strategy (the causative suffix), four pairs that use an indeterminate strategy (lexical alterations), and nine pairs that use a neutral strategy (LV alternations). Some of the pairs use LV alternations in addition to another strategy; some use a strategy not discussed by Nichols *et al.*; and I could not evaluate two pairs because I lack data showing the correspondences between forms. Nevertheless, my findings show that Afghan Wakhi's favored correspondence is the neutral type, which is unsurprising given its reliance on LVCs. The widespread use of periphrastic LVC causative constructions tips the scale even further in that direction.

CHAPTER 8

FUTURE DIRECTIONS

In this dissertation, I have described topics related to predication and argument structure in Afghan Wakhi. While studying these topics, I have (unsurprisingly) encountered a number of other topics that either (a) I was unable to do justice to, or (b) are worthy of investigation but are outside the scope of the present study. In this chapter, I present several of these topics as directions for future linguistic analysis.

The heart of the study concerns light verb constructions in Afghan Wakhi. As I note in Chapter 6, my study of LVCs is a pioneer effort. As such, I consider it not an end but a mere beginning to understanding such a pervasive and complicated predication strategy. A wider sample of LVCs, especially LVCs using less-productive LVs (cf. §6.5), would greatly enhance our ability to identify significant patterns in meaning and argument structure. A larger corpus of LVCs would also facilitate a more detailed study of productive patterns of alternation between the different LVs that collocate with a single PV.

Although studies of LVCs in Persian abound (Karimi-Doostan 2011; Folli, Harley & Karimi 2005; Family 2014; Eshaghi & Doustan 2021, to name just a few), descriptions of LVCs in other Iranian languages are practically nonexistent. From that perspective, I hope that my study of LVCs in Afghan Wakhi sparks the investigation of LVCs in other related languages, especially Pamir languages and others in the East Iranian family. Since LVCs are a predication strategy common across the Iranian family, our understanding of them would benefit greatly from a wider selection of data and descriptions on which to base comparative analysis. Cross-linguistic comparison of LVCs in Iranian languages will surely shed light on patterns of productivity and perhaps also on processes of language change. It will also help us refine our

language-specific operational definitions of LVCs and identify characteristics useful for broader cross-linguistic comparison, i.e., DESCRIPTIVE CATEGORIES and COMPARATIVE CONCEPTS (cf. Haspelmath 2010).

Many of the examples used in this dissertation contain different types of subordinate and coordinate clauses, including (but not limited to) relative clauses, adverbial clauses, purpose clauses, reason clauses, and complement clauses. Of these, the only type I actually address to some degree is relative clauses (cf. §3.4.3). As I observe in my description of relative clauses, the generic complementizer *ki* 'COMP' can be used to introduce many types of subordinate and / or complement clauses; however, other subordinating and complementizing strategies do exist and deserve to be studied. For those clauses that are introduced via *ki*, further research is needed to discover how the differences between the different types of clauses are signaled. This research should investigate topics such as the internal morphosyntactic structure of subordinate clauses, their external distribution (location in the main clause), etc. For example, as I briefly note in §1.6.2 and §1.7, non-finite complement clauses typically occur in the syntactic slot normal for the grammatical relation they hold (e.g., clause-initial for a subject; preverbal for a direct object), but finite complement clauses occur in postverbal position. However, the structure, syntactic position, and associated function(s) of other types of clauses have yet to be described.

I characterize the default constituent order of Afghan Wakhi as SOV (cf. §1.7, §4.1.1, and SanGregory (2025a: 274)) based on the patterns seen in pragmatically neutral clauses. In reality, constituent order varies widely depending on the pragmatics involved at the time a particular utterance is made. This variability is especially clear in the various types of marked nonverbal predicate constructions (§5.2.3). However, similar variations in constituent order can be seen in clauses with lexical verbs and LVCs, as well as in the order of a PV and LV within an

LVC and in the ability of other constituents to intervene between them (cf. §6.2). A detailed study of constituent order across all types of clauses, including associated prosodic melodies and / or cues, is needed in order to better understand the pragmatic functions of the different syntactic structures found in Afghan Wakhi.

In §3.1.3.9, I provide a few examples of differential object marking (DOM) as found in Afghan Wakhi, which can affect any direct object NP regardless of person or animacy. Many other examples of DOM can be found throughout this dissertation, i.e., direct objects that are marked via the Accusative case (=*i*) rather than taking the Nominative form (nouns and 3SG pronouns) or the suppletive Default form (SAP pronouns). Although I confidently rule out animacy as a conditioning factor for DOM in §3.1.3.9, I do not yet know which factor(s) are in fact relevant. Specificity and definiteness are two likely candidates for conditioning DOM (Malchukov & de Swart 2009: 345). Karimi's (1989: 65–70) analysis of Persian DOM as conditioned by specificity leads me to suspect specificity, as does the homophony of the Accusative enclitic and the specificity enclitic (cf. §3.1.4). However, I recognize that homophony is not a reliable indicator, especially since there are at least six different /*i*/ morphemes in Afghan Wakhi (ACC, VOC, EZ, SPEC, ADJ, and 3SG enclitic) that could potentially have different etymological sources. Furthermore, if DOM is conditioned by specificity, I would expect SAP pronouns to always receive Accusative marking since speech act participants are inherently specific. The same can also be said of SAP pronouns and definiteness, so even if specificity or definiteness is a conditioning factor for DOM, it seems that some other unidentified factor must also be relevant. Needless to say, DOM in Afghan Wakhi is certainly an area where further research is needed.

In some LVCs, we find an intriguing mismatch between semantics and morphology: the use of the Genitive to mark a participant that seems like a core semantic argument (*skɐ ti ruj ʃɔdɐt rɐnd* ‘on your face witness gives’, i.e., ‘witnesses against you’ (483); *ʐɨ qɐr wəzd* ‘my anger came’, i.e., ‘I got angry’ (560); *t͡sʊ ʐɨ jɔdən rəwjdi* ‘from my memory went’, i.e., ‘I forgot’ (567)). These Genitive-marked participants seem to correlate with malefactive semantics, but further study of predicates (both lexical verbs and LVCs) with malefactively affected participants is needed to better understand this use of the Genitive.

Last but certainly not least, there is great need for a dictionary of Afghan Wakhi. A dictionary would make ongoing synchronic analysis easier; it would also facilitate much-needed comparative study of the Pamir group of Eastern Iranian languages and thereby enable us to continue extending our understanding of the languages spoken in this remote region of the world.

APPENDICES

A. ABBREVIATIONS

A	agent-like argument (transitive)
ABL	ablative
ACC	accusative
ADJ	adjectivalizer
ADV	adverbializer
AGT	agent
AP	adjective phrase
CAUS	causative
CC	complement clause
CSE	causee
CLF	classifier
CMPR	comparative
COM	comitative
COMP	complementizer
COP	copula
CSR	causer
DAT	dative
DEM	demonstrative
DFLT	default
DISC	discourse marker
DIST	distal
DO	direct object
DOM	differential object marking
DSM	differential subject marking
EMPH	emphatic
EXP	experiencer
EZ	ezafe
FACT	factual
FIG	figure
GEN	genitive
GL	goal
GRND	ground
INF	infinitive
INTJ	interjection
INTS	intensifier
IO	indirect object
IPFV	imperfective
ITR	intransitive
LFG	Lexical-Functional Grammar
LOC	locative or location
LV	light verb
LVC	light verb construction
LWC	language of wider communication
MED	medial
NEG	negative
NMLZ	nominalizer
NOM	nominative
NP	noun phrase
NP_{POSS}	adnominal possessor
P	patient-like argument (transitive)
PAT	patient
PCU	perception, cognition, utterance
PL	plural
PN	proper noun
POSD	possessed noun phrase
POSR	possessor noun phrase
POSS	possessive
PP	prepositional phrase
PRED	predicate
PRED2	secondary predicate
PRF	perfect
PRIV	privative
PROH	prohibitive
PROX	proximal
PRS	present
PST	past
PV	preverb
QNT	quantifier
R	recipient-like argument (ditransitive)
R-OBJ	recipient-object
REC	recipient
REFL	reflexive
S	single argument (intransitive)
SAP	speech act participant
SAPTR	abbreviation of arguments used in typological studies of alignment
SBJV	subjunctive
SG	singular
SIT	situation
SPEC	specific
SRC	source
STIM	stimulus
SUBJ	subject

SUPER	superlative	TR	transitive
T	theme-like argument (ditransitive)	VOC	vocative
T-OBJ	theme-object	VOT	voice onset time
TH	theme	Q	polar question particle

B. VERB STEMS

This appendix includes all three stems (nonpast, past, and perfect) for each verb in my corpus, as well as the 3SG and infinitive forms. I give the bare nonpast stem without any additional morphology (e.g., subject indexing suffixes), but I do include the subject indexing suffix for regular 3SG forms. For the past and perfect forms, I include the tense suffixes. Where a degemination process has taken place (i.e., where a stem-final consonant and affix-initial consonant are identical), I transcribe what is actually pronounced, not what I analyze the "underlying" form to be. This list is organized alphabetically by infinitive forms.

Gloss	Nonpast	3SG	Past	Perfect	Infinitive
knock down	*bɨn*	*bɨn-d*	*bɔn-di*	*bɨn-ʊt-k*	*bɨn-ɐk*
make	*gɔç*	*gɔç-t*	*gɔç-ti*	*çʊt-k*	*çɐk*
say	*çɐn*	*çɐn-d*	*çɐt-i*	*çən-ʊt-k*	*çən-ɐk*
take	*dərz*	*dərz-d*	*dəʐ-di*	*dəʐ-g*	*dərz-ɐk*
see	*didɨj*	*didɨj-d*	*didɨj-di*	*didɨj-ʊt-k*	*didɨj-ɐk*
hit	*di*	*dʊʃt*	*dʊʃ-ti*	*di-ʊt-k*	*ding-ɐk*
know	*diʃ*	*diʃ-t*	*diʃ-ti*	*diʃ-ʊt-k*	*diʃ-ɐk*
show	*disʊv*	*disʊv-d*	*disɔv-di*	*disʊv-ʊt-k*	*disʊv-ɐk*
milk	*ðit͡s*	*ðit͡s-t*	*ðəwɟ-ni*	*ðʊç-k*	*ðit͡s-ɐk*
mill, grind	*ðʊç*	*ðʊç-t*	*ðɔç-ti*	*?*	*ðʊç-ɐk*
read	*d͡ʒɔj*	*d͡ʒɔj-d*	*d͡ʒɔj-di*	*d͡ʒɔj-ʊt-k*	*d͡ʒɔj-ɐk*
snort	*frʊx*	*frʊx-t*	*frɔx-ti*	*?*	*?*
find	*gɔt*	*gɔt*	*gɔt-i*	*gət-ʊt-k*	*gət-ɐk?*
rise	*giz*	*giz-d*	*gəz-di*	*gəz-g*	*giz-ɐk*
run	*gʊfs*	*gufʊs-t*	*gʊfs-ti*	*gʊfs-ʊt-k*	*gʊfs-ɐk*
arrive	*ɟɐt*	*ɟɐt*	*ɟɐt-i*	*ɟət-ʊt-k*	*ɟət-ɐk*
leave	*jɔd*	*jɔθ-t*	*jɔθ-ti*	*jɔd-ʊt-k*	*jɔd-ɐk?*
turn, spill	*ɟir*	*ɟir-d*	*ɟir-di*	*ɟir-ʊt-k*	*ɟir-ɐk*
gather	*ɟərt*	*ɟərt*	*ɟərt-i*	*ɟərt-ʊt-k*	*ɟərt-ɐk*
eat	*jɐw*	*jit*	*jit-i*	*jit-k*	*jit-ɐk*
carry	*jund*	*jund*	*jut-i*	*jut-k*	*jund-ɐk*
split, crack	*kɐf*	*kɐf-t*	*kɐf-ti*	*kɐf-k*	*kɐf-ɐk*
laugh	*kɐnd*	*kɐnd*	*kɐnd-i*	*kənd-ʊt-k*	*kɐnd-ɐk*
pull out	*niçind*	*niçind*	*niç-ti*	*niç-it-k, niçin-g*	*niçind-ɐk*
disappear	*nɨs*	*nɨs-t*	*nɐʂ-ti*	*nɨs-ʊt-k*	*nɨs-ɐk*
soak	*nɨv*	*nɨv-d*	*nɐv-di*	*nɨv-ʊt-k*	*nɨv-ɐk*
cry	*nɨw*	*nɨw-d*	*nɐw-di*	*nɨw-ʊt-k*	*nɨw-ɐk*
emerge	*nɨwz*	*nɨwəz-d*	*niʊʂ-ti*	*niʊʂ-k*	*nɨwz-ɐk*
plant upright	*nund*	*nund*	*?*	*nund-ʊt-k*	*nund-ɐk*
sit down	*nʊzd*	*?*	*nʊj-ni*	*niən-g*	*nʊzd-ak*
cook	*pɐt͡s*	*pɐt͡s-t*	*pɐt͡s-ti*	*pɐt͡s-ʊt-k*	*pɐt͡s-ɐk*
ask	*pərs*	*pərs-t*	*pərs-ti*	*pərs-ʊt-k*	*pərs-ɐk*
strike	*pərvi*	*?*	*pərvʊi*	*pərvʊt-k*	*pərvi-ɐk*
graze	*pɨj*	*pɨj-d*	*pɔj-di*	*pɨj-ʊt-k*	*pɨj-ɐk*

Gloss	Nonpast	3SG	Past	Perfect	Infinitive
fall (high)	*plɐn*	*plɐn-d*	*plɐt-i*	*plən-ʊt-k*	*plən-ɐk*
return	*pʃəw*	*pʃit*	*pʃit-i*	*pʃit-k?*	*pʃəw-ɐk*
put on	*pʊmʊt͡s*	*pʊmʊst*	*pʊmɐç-ti?*	*pʊmʊç-k?*	*pʊmt͡s-ɐk*
give	*rɐnd*	*rɐnd*	*rʊt-i*	*rʊt-k*	*rədɔwən*
flee	*rən*	*rəl-t*	*rən-i*	*rən-ʊt-k?*	*rən-ɐk?*
leap	*rəwʊz*	*rəwʊz-d*	*rəwʊz-di*	*rəwz-ʊt-k*	*rəwz-ɐk*
fall out (teeth)	*riz*	*riz-d*	*riz-di?*	*riz-ʊt-k*	*riz-ɐk?*
sleep	*rʊçʊp*	*rʊçʊp-t*	*rɔçɔp-ti*	*rʊçp-ʊt-k*	*rʊçp-ɐk*
send (person)	*rʊmi*	*?*	*rʊmʊt-i*	*rʊmʊt-k*	*rʊmi-ɐk?*
cut off, slit	*rʊstʊv*	*rʊstʊv-d*	*rʊstɔv-di*	*rʊstʊv-ʊt-k*	*rʊstʊv-ɐk*
go	*rʊt͡ʂ*	*rʊʂt*	*rəwʝ-di*	*rʊç-k*	*rʊt͡ʂ-ɐk*
kill	*ʃɐj*	*ʃit*	*ʃit-i*	*ʃit-k*	*ʃɐj-ɐk*
rub	*sɔç*	*?*	*?*	*?*	*?*
appear	*sədʊj*	*sədʊj-d*	*sədɔj-di*	*sədʊj-ʊt-k*	*sədʊj-ɐk*
ascend	*sɐn*	*sɐn-d*	*sɐt-i*	*sən-ʊt-k*	*sən-ɐk*
be cold	*ʂkɐv*	*ʂkɐv-d*	*ʂkɐv-di*	*ʂkɐf-k*	*ʂkɐv-ɐk*
crack	*ʂkʊd*	*?*	*?*	*?*	*?*
break	*ʂkʊnd*	*?*	*ʂkʊt-i*	*ʂkʊt-k*	*ʂkʊnd-ɐk*
search for	*ʂkurg*	*ʂkur-d*	*ʂkur-di*	*ʂkurg-ʊt-k?*	*ʂkurg-ɐk*
send	*stʊj*	*stʊj-d*	*stʊt*	*stʊt-k*	*stʊj-ɐk*
move, shake	*tɐp*	*tɐp-t*	*tɐp-ti*	*təp-ʊt-k*	*təp-ɐk*
peel (logs)	*tɨʂ*	*tɨʂ-t*	*tɨʂ-ti?*	*tɨʂ-ʊt-k?*	*tɨʂ-ɐk*
hug	*trɐnd͡ʒ*	*trɐnd͡ʒ-d*	*trɐnd͡ʒ-di*	*trɐnd͡ʒ-ʊt-k?*	*trɐnd͡ʒ-ɐk*
cluck	*t͡ʂɐx*	*t͡ʂɐx-t*	*t͡ʂɐx-ti*	*t͡ʂəx-ʊt-k?*	*t͡ʂəx-ɐk*
request	*t͡ʃɐlg*	*t͡ʃɐl-d*	*t͡ʃɐld-i*	*t͡ʃəlg-ʊt-k*	*t͡ʃɐlg-ɐk*
do	*t͡sɐr*	*t͡sɐr-t*	*kər-ti*	*kər-k*	*t͡sər-ɐk*
enter	*t͡ʃərəm*	*t͡ʃərəm-d*	*t͡ʃər-ni*	*t͡ʃərəm-ʊt-k*	*t͡ʃərəm-ɐk*
pick, pluck	*t͡ʃɨp*	*t͡ʃɨp-t*	*t͡ʃʊv-di*	*?*	*t͡ʃəp-ɐk*
go	*t͡ʂɐw*	*t͡ʂit*	*t͡ʂit-i*	*?*	*t͡ʂɨw-ɐk*
slaughter	*t͡ʃʊç*	*t͡ʃʊç-t*	*t͡ʃʊç-ti?*	*t͡ʃʊc-k?*	*t͡ʃʊç-ɐk?*
beat, pound	*t͡ʃuk*	*t͡ʃuk-t*	*t͡ʃuk-ti?*	*t͡ʃuk-ʊt-k?*	*t͡ʃuk-ɐk*
copula	*tʊj*	*tʊj*	*tu*	*tu-ʊt-k*	*tʊj-ɐk*
depart	*---*	*---*	*tɐj-di*	*---*	*tuk*
stretch	*tʊt͡ʃʊv*	*tʊt͡ʃʊv-d*	*tʊt͡ʃɔv-di*	*tʊt͡ʃʊv-ʊt-k*	*tʊt͡ʃʊv-ɐk*

Gloss	Nonpast	3SG	Past	Perfect	Infinitive
weave, knit	*ʊf*	*ʊf-t*	*ɔf-ti*	*ʊf-ʊt-k*	*ʊf-ɐk*
fasten	*vɐnd*	*vɐnd*	*vɐs-ti*	*vənd-ʊt-k*	*vɐnd-ɐk*
abuse	*vɐrɐnd*	*vɐrɐnd*	*vɐrɔt-i?*	*vərənd-ʊt-k*	*vərənd-ɐk*
shear	*vərin*	*vərin-d*	*?*	*?*	*vərin-ɐk*
wring	*vəzəm*	*vəzəm-d*	*vəzɔm-di*	*vəzm-ʊt-k*	*vəzm-ɐk*
fall	*wɐz*	*wɐz-d*	*wɐʂ-ti*	*wɐʂ*	*wɐz-ɐk*
become	*wɔt͡s*	*wɔst*	*vit-i*	*vit-k*	*wɔt͡s-ɐk*
water before plowing	*wərwər*	*wərwər-d*	*wərɔw-di*	*?*	*wərwər-ɐk*
spread out	*wərxʊv*	*wərxʊv-d*	*wərxɔv-di*	*wərxəv-ʊt-k*	*wərxəv-ɐk*
come	*wəzi*	*wizit*	*wəz-di*	*wəz-g*	*wəzɐjən*
wash	*wəzdi*	*wəzdʊʃt*	*wɔzdʊʃ-ti*	*wəzdin-g*	*wəzding-ɐk*
see	*win*	*win-d*	*win-di*	*win-ʊt-k*	*win-ɐk*
hold	*wʊdər*	*wʊdər-t*	*wɔdɐr-ti*	*wʊdər-ʊt-k*	*wʊdər-ɐk*
stand up	*wʊrəfs*	*wʊrəfs-t*	*wɔrɔfs-ti?*	*wʊrəfs-ʊt-k*	*wʊrəfs-ɐk*
remain	*wʊrʊt͡ʂ*	*wʊrʊʂt*	*wʊrəj*	*wʊrəç-k*	*wʊrʊt͡ʂ-ɐk*
fear	*wʊʂi*	*wiʂit*	*wʊʂ-ti*	*wʊʂ-ʊt-k*	*wʊʂ-ɐk*
bring	*wʊzʊm*	*wʊzʊm-d*	*wɔzɔm-di*	*wʊzm-ʊt-k*	*wʊzm-ɐk*
pull	*xɐʂ*	*xɐʂ-t*	*xɐʂ-ti*	*xəʂ-ʊt-k*	*xəʂ-ɐk*
descend	*xɐm*	*xɐm-d*	*xɐm-di*	*xəm-ʊt-k*	*xəm-ɐk*
wrap around	*zəwɐj*	*?*	*?*	*?*	*zəwɐj-ɐk*
grab	*zʊnd*	*zʊnd*	*zʊt-i*	*zʊt-k?*	*zʊnd-ɐk*
spin (fiber)	*ʒɨp*	*ʒɨp-t*	*?*	*ʒɨp-ʊt-k?*	*ʒɨp-ɐk*
burn	*θɨw*	*θɨw-d, θit?*	*θʊt-i, θɐw-di*	*θʊt-k*	*θɨw-ɐk*

C. LVCS WITH 'TO DO'

TR: DO (§6.4.1.1)

<agent, patient>		
ɐmɐli t͡sərɐk	application do	'to do'
ɐrɐ t͡sərɐk	saw do	'to saw'
bɐdnɔm t͡sərɐk	bad-name do	'to shame'
bɐrɐsi t͡sərɐk	inspection do	'to inspect, to check'
bərbɔd t͡sərɐk	waste do	'to waste'
ɔbɔd t͡sərɐk	establishment do	'to establish, to develop'
dɐm t͡sərɐk	brew do	'to brew'
dʊɔbɐ t͡sərɐk	second-watering do	'to do the second watering'
d͡ʒir t͡sərɐk	make do	'to make, to build, to fix'
ðis t͡sərɐk	dough do	'to make dough'
ɛhtɛrɔm t͡sərɐk	respect do	'to respect'
ɛntɛxɔb t͡sərɐk	choice do	'to choose'
ɣɐwrɐsi t͡sərɐk	consideration do	'to consider someone'
gir t͡sərɐk	trap do	'to capture'
gʊl mɔlɐ t͡sərɐk	trowel do	'to trowel'
isɔb t͡sərɐk	account do	'to count'
istifɔdɐ t͡sərɐk	usage do	'to use'
ɪsteplɐr t͡sərɐk	stapler do	'to staple'
jʊçk t͡sərɐk	learning do	'to teach, to raise'
kuntrul t͡sərɐk	control do	'to control'
mɐrifi t͡sərɐk	introduction do	'to introduce'
minɐt t͡sərɐk	scolding do	'to scold'
mʊsqrɐ t͡sərɐk	mocking do	'to mock'
nɐql t͡sərɐk	story do	'to tell a story, to talk'
nəpʊsən t͡sərɐk	comb do	'to comb'
nəwiʃtɐ t͡sərɐk	writing do	'to write'
niɔr t͡sərɐk	stirring do	'to stir'
niknɔm t͡sərɐk	good-name do	'to honor'
nʊʐdʊn t͡sərɐk	weed do	'to weed'
pɐrwɐrəʃ t͡sərɐk	discipline do	'to discipline'
pist t͡sərɐk	skin do	'to peel'
qɐjd t͡sərɐk	restriction do	'to restrict, to stop'
qɔt t͡sərɐk	fold do	'to fold'
qbɨl t͡sərɐk	acceptance do	'to accept'
qitʃi t͡sərɐk	scissors do	'to cut with scissors'
qɨw t͡sərɐk	call do	'to call'
rɐng t͡sərɐk	color do	'to paint, to color'
sɔjl t͡sərɐk	watching do	'to watch'
ʂəriʂ t͡sərɐk	glue do	'to glue'
ʃəru t͡sərɐk	beginning do	'to begin'
ʂkɔr t͡sərɐk	hunter do	'to hunt'
ʂpinij t͡sərɐk	shepherding do	'to shepherd'

tɐbdil t͡sərɐk	change do	‘to change’
tɐkmil t͡sərɐk	completion do	‘to complete’
tɐkrɔr t͡sərɐk	repetition do	‘to repeat’
tɐrbiɐ t͡sərɐk	correction do	‘to correct’
tɐrif t͡sərɐk	praise do	‘to praise’
tɐxɐlʊs t͡sərɐk	surname do	‘to use a surname’
tikmɐj t͡sərɐk	picking do	‘to pick clean’
tilɔwɐt t͡sərɐk	recitation do	‘to recite’
tir t͡sərɐk	passing do	‘to pass, to spend’
t͡ʃɐlɔn t͡sərɐk	start do	‘to start’
t͡ʃɐrv t͡sərɐk	grease do	‘to moisturize’
t͡ʃuʈ t͡sərɐk	tear do	‘to tear’
wirɔn t͡sərɐk	ruin do	‘to ruin’
wutu t͡sərɐk	iron do	‘to iron’
xɐridɔri t͡sərɐk	purchasing do	‘to purchase’
xɐt kɐʃi t͡sərɐk	ruler do	‘to measure with a ruler’
xɐtm t͡sərɐk	end do	‘to end’
xbɐr t͡sərɐk	news do	‘to awaken’

<agent, theme>

ɐj t͡sərɐk	drive do	‘to drive’
bərd͡ʒɔj t͡sərɐk	place do	‘to set in place’
d͡ʒɐm t͡sərɐk	gather do	‘to gather’
ɪstɔd t͡sərɐk	stand do	‘to stop’
judɨj t͡sərɐk	theft do	‘to steal’
pə dɐm t͡sərɐk	on shoulder do	‘to carry on one’s back’
pər t͡sbɐs t͡sərɐk	on-back do	‘to follow, to chase’
tɐwzi t͡sərɐk	distribution do	‘to distribute’
t͡ʃɔrɐ t͡sərɐk	location do	‘to locate’
vər t͡sərɐk	load do	‘to load’

<agent, location>

bɐ t͡sərɐk	kiss do	‘to kiss’
pɔsbɔnd t͡sərɐk	bandage do	‘to bandage’
rubɐl tep t͡sərɐk	tape do	‘to tape’
tir t͡sərɐk	arrow do	‘to shoot’

<agent, goal>

jɔd t͡sərɐk	memory do	‘to remember’

<agent, stimulus>

bɐxʃiʃ t͡sərɐk	forgiveness do	‘to forgive’
tɐʃri t͡sərɐk	description do	‘to describe’

<experiencer, stimulus>

tɐjin t͡sərɐk	noticing do	‘to notice’

<agent, situation>

ɔrzu t͡sərɐk	wish do	‘to wish’
fikr t͡sərɐk	thought do	‘to think’
nəsiɐt t͡sərɐk	advice do	‘to advise’
ʃʊkɔjɐt t͡sərɐk	complaint do	‘to complain’

<agent, recipient>

kəmʊk t͡sərɐk	help do	‘to help’
sɐlɔm t͡sərɐk	hello do	‘to greet’
t͡ʃɔplusi t͡sərɐk	flattery do	‘to flatter’

TR: CAUSE (§6.4.1.3)

<causer, causee, situation>

mɐd͡ʒbur t͡sərɐk	forced do	‘to force’
zur t͡sərɐk	strength do	‘to cause’

TR: CAUSE STATE (§6.4.1.2)

<agent, patient>

ɐl t͡sərɐk	soft do	‘to soften’
bərɔbɐr t͡sərɐk	just-right do	‘to make just right’
bidɔr t͡sərɐk	awake do	‘to awaken’
ɔmɔdɐ t͡sərɐk	ready do	‘to ready’
d͡ʒir t͡sərɐk	prepare do	‘to prepare’
gɐt͡ʃ t͡sərɐk	mixed do	‘to mix’
gırıftɔr t͡sərɐk	trapped do	‘to catch, to trap’
kɐl t͡sərɐk	bald do	‘to shave bald’
kur t͡sərɐk	blind do	‘to blind’
mɐlim t͡sərɐk	clear do	‘to make clear’
midɐ t͡sərɐk	small pieces do	‘to cut into pieces’
nɔmzɔd t͡sərɐk	engaged do	‘to engage’
pɔk t͡sərɐk	clean do	‘to clean’
pɔkzɐ t͡sərɐk	clean do	‘to clean’
pirɐ t͡sərɐk	filled do	‘to fill, to complete’
rɔst t͡sərɐk	straight do	‘to lie down’
ruʃɐn t͡sərɐk	shining do	‘to light’
rʊxsɐt t͡sərɐk	released do	‘to release’
ʃɐrmindɐ t͡sərɐk	ashamed do	‘to shame’
sɐvz t͡sərɐk	green do	‘to grow’
sʊrx t͡sərɐk	red do	‘to fry, to heat, to redden’

sʊtk t͡sərɐk	satiated do	‘to feed’
ʂux t͡sərɐk	secure do	‘to secure’
tɔzɐ t͡sərɐk	fresh do	‘to freshen’
təjɐ t͡sərɐk	prepared do	‘to prepare’
tiɔr t͡sərɐk	ready do	‘to ready’
tiz t͡sərɐk	sharp do	‘to sharpen’
wʊsk t͡sərɐk	dry do	‘to dry’
xɐjt͡ʃ t͡sərɐk	wet do	‘to wet’
zɐxmi t͡sərɐk	injured do	‘to injure’
xund͡ʒigɐr t͡sərɐk	liver-blood do	‘to distress’
zɐr t͡sərɐk	wounded do	‘to wound’

<agent, theme>

pɐs t͡sərɐk	back do	‘to move back’
pidɔ t͡sərɐk	found do	‘to find’
prʊt t͡sərɐk	front do	‘to move forward
tit t͡sərɐk	scattered do	‘to scatter’
ʊʈ t͡sərɐk	open do	‘to open’
wut͡ʃ t͡sərɐk	high do	‘to raise’
xɔli t͡sərɐk	empty do	‘to pour’

ITR: DO (§6.4.1.4)

<agent>

ɐrɐkɐt t͡sərɐk	departure do	‘to depart’
ɐskɐri t͡sərɐk	soldiering do	‘to serve in the military’
biɐdɐbi t͡sərɐk	misbehavior do	‘to misbehave’
ɔʃpɐt͡si t͡sərɐk	cooking do	‘to work as a cook’
ɔʃqiɟ t͡sərɐk	adultery do	‘to commit adultery’
dəhɔ t͡sərɐk	prayer do	‘to pray’
diqɔniɟ t͡sərɐk	farming do	‘to farm’
d͡ʒʊwɔligɐri t͡sərɐk	servanthood do	‘to work as a servant’
ɣɐjrɔziri t͡sərɐk	absence do	‘to be absent’
gʊnɔ t͡sərɐk	sin do	‘to sin’
imɔjɐ t͡sərɐk	gesture do	‘to gesture’
iʃɔrɐ t͡sərɐk	gesture do	‘to gesture’
jɐrk t͡sərɐk	work do	‘to work’
kut͡ʃ t͡sərɐk	migration do	‘to migrate’
nɐng t͡sərɐk	crouch do	‘to crouch’
qisɐ t͡sərɐk	story do	‘to tell a story, to talk’
rʊqɔsi(j) t͡sərɐk	dancing do	‘to dance’
ʃɔgɨn t͡sərɐk	new year do	‘to celebrate the new year’
sədɔ t͡sərɐk	sound do	‘to make a sound’
ʃuxi t͡sərɐk	joke do	‘to joke’

ʂənɔwɐrij t͡sərɐk	swimming do	‘to swim’
wɐʏɐsi t͡sərɐk	howling do	‘to howl’
wɐz t͡sərɐk	preaching do	‘to preach’
xəzmɐt t͡sərɐk	service do	‘to serve’
xʊʃij t͡sərɐk	happiness do	‘to celebrate’
zɪndɐgij t͡sərɐk	life do	‘to live’

<agent, goal [‘on’] >

ɐmlɐ t͡sərɐk	attack do	‘to attack’
ɐmr t͡sərɐk	command do	‘to command’
fəjr t͡sərɐk	fire do	‘to fire (on)’
ʈakʈak t͡sərɐk	knock do	‘to knock’

<agent, comitative [‘COM’+ABL]>

ɐrusi t͡sərɐk	wedding do	‘to get married’
dɐwɔ t͡sərɐk	quarrel do	‘to quarrel’
dusti t͡sərɐk	friendship do	‘to befriend’
d͡ʒɐngd͡ʒɔl t͡sərɐk	argument do	‘to argue’
kəmʊk t͡sərɐk	help do	‘to help’
ɣɔlmɐɣɔl t͡sərɐk	confusion do	‘to cause confusion’
mɐslɐt t͡sərɐk	planning do	‘to plan’
ʂtik t͡sərɐk	playing do	‘to play’

<agent, source [‘from’+ABL]>

məfizɐt t͡sərɐk	guard do	‘to guard’
qarz t͡sərɐk	loan do	‘to borrow’

ITR: EXPERIENCE (§6.4.1.6)

<experiencer>

ɐrɐq t͡sərɐk	sweat do	‘to sweat’
wɐrɐm t͡sərɐk	swelling do	‘to swell’
xfɐ t͡sərɐk	upset do	‘to get upset’
xʊʃ t͡sərɐk	happiness do	‘to like’
zuf t͡sərɐk	faint do	‘to faint’

<experiencer, stimulus [‘from’+ABL]>

fɔjdɐ t͡sərɐk	benefit do	‘to benefit’
nəfrɐt t͡sərɐk	hatred do	‘to hate’

<experiencer, stimulus [‘LOC’]>

ɪftɪxɔr t͡sərɐk	pride do	‘to be proud’
qɐr t͡sərɐk	anger do	‘to get angry’

ITR: UNDERGO (§6.4.1.5)

<theme>		
dʊwɔm t͡sərɐk	continuation do	‘to continue’
fɐrq t͡sərɐk	difference do	‘to differ’
səqut t͡sərɐk	falling do	‘to fall (from power)’

D. LVCS WITH 'TO MAKE'

DO (§6.4.2.1)

<agent, patient>

jupk çɐk	water make	'to water'
tindɐ çɐk	spinning make	'to spin (fiber)'
t͡sʊtk çɐk	plowing make	'to plow'
wərg çɐk	furrow make	'to furrow'
ɐwz çɐk	lake make	'to soak'

CAUSE STATE (§6.4.2.2)

<agent, patient>

ɣɐmgɪn çɐk	sorrowful make	'to make sorrowful'
nɔkɔm çɐk	unsuccessful make	'to fail (someone)'
pɐxpɐx çɐk	flat make	'to creep'
pərɐjʃɔn çɐk	worried make	'to cause worry'
psjupk çɐk	drowned make	'to drown'
qɐr çɐk	anger make	'to anger'
ʃɐk çɐk	bad make	'to make bad, to ruin'
xfɐ çɐk	upset make	'to make sad'
xʊʃ çɐk	happy make	'to make happy'

<agent, theme>

mɐrum çɐk	excluded make	'to expel'
tɪt çɐk	scattered make	'to scatter'

<agent, location>

t͡ʃɐl çɐk	muddy make	'to make muddy'

E. LVCS WITH 'TO GIVE'

TRANSFER (§6.4.3.1)

<agent, patient>

ɐzɔb rədɔwən	torment give	'to torment'
bɐrɐkɐt rədɔwən	blessing give	'to bless'
ɔgɔi rədɔwən	awareness give	'to make aware'
d͡ʒizɔ rədɔwən	punishment give	'to punish'
fɐnd rədɔwən	lie give	'to lie'
fiʃɔr rədɔwən	pressure give	'to pressure, to squeeze'
frib rədɔwən	lie give	'to lie'
qɐrz rədɔwən	loan give	'to loan'
ʃɔdɐt rədɔwən	witness give	'to bear witness'
səbɐq rədɔwən	lesson give	'to teach'
siminɔr rədɔwən	seminar give	'to teach'
trining rədɔwən	training give	'to train'

<agent, recipient>

dəhɔ rədɔwən	prayer give	'to bless'
d͡ʒɔjzɐ rədɔwən	reward give	'to reward'
fɐnd rədɔwən	lie give	'to lie'
fiʃɔr rədɔwən	pressure give	'to pressure, to squeeze'
id͡ʒɔzɐ rədɔwən	permission give	'to permit'
kʊnd rədɔwən	wife give	'to marry to a woman'
rɔj rədɔwən	vote give	'to vote'

<agent, theme, recipient>

dɐrs rədɔwən	lesson give	'to teach'
niʂɔn rədɔwən	show give	'to show'
pʊr rədɔwən	money give	'to sell'
siminɔr rədɔwən	seminar give	'to teach'

<agent, recipient, situation>

d͡ʒɐwɔb rədɔwən	answer give	'to answer'

<agent, goal, situation>

ʃɔdɐt rədɔwən	witness give	'to bear witness'

ACT (§6.4.3.2)

<agent, patient>

ɐnd͡ʒɔm rədɔwən	accomplishment give	'to accomplish'
ɔzɔr rədɔwən	harassment give	'to harass'

d͡ʐuʂ rədɔwən	boiling give	‘to boil (something)’
qɐrɔr rədɔwən	appointment give	‘to appoint’

<agent, theme>

nid͡ʒɔt rədɔwən	rescue give	‘to rescue’
xtɔ rədɔwən	deliverance give	‘to deliver’

<agent, goal>

piʂ rədɔwən	forward give	‘to chase’

LOSE (§6.4.3.3)

<source, theme>

t͡sʊ dɐstən rədɔwən	from hand give	‘to lose’

F. LVCS WITH 'TO HIT'

TR: CONTACT (§6.4.4.1)

<agent, theme>

ʈɐx dingɐk	shaking hit	'to shake out'
tilɐ dingɐk	push hit	'to push'

<agent, goal (DO)>

dɐst dingɐk	hand hit	'to touch'
dɨdɐ dingɐk	smoke hit	'to clean out smoke'
ptʊk dingɐk	stamp hit	'to stamp'
qlɐm dingɐk	scratch hit	'to scratch, to scrape'
tpʊt͡ʃ dingɐk	hoe hit	'to hoe'
zɐng dingɐk	bell hit	'to call'

<agent, goal (IO)>

dit͡ʃɔr dingɐk	opposite hit	'to meet face-to-face'

TR: SPREAD (§6.4.4.2)

<agent, goal>

ðɐrt dingɐk	manure hit	'to spread manure'
puʃ dingɐk	cover hit	'to cover'
ʂəriʂ dingɐk	glue hit	'to put glue on'
ʃʊt dingɐk	dirt hit	'to cover with dirt'
tuxm dingɐk	seed hit	'to sow'

TR: PLACE (§6.4.4.3)

<agent, theme>

lʊj dingɐk	stack hit	'to stack'
ʂɨʂɐ dingɐk	glass hit	'to install windows'
t͡suq dingɐk	upright hit	'to erect'

TR: UTTERANCE (§6.4.4.4)

<agent, recipient>

gɐp dingɐk	chat hit	'to talk to'

ITR: COGNITION & UTTERANCE (§6.4.4.4)

<agent, comitative [‘COM’+ABL]>

gɐp dingɐk	chat hit	‘to chat’

<agent, location [‘LOC’]>

təkiɐ dingɐk	lean hit	‘to trust in’
t͡ʃʊrt dingɐk	thought hit	‘to think’

<agent, situation>

t͡ʃʊrt dingɐk	thought hit	‘to think’

ITR: PLAY INSTRUMENT (§6.4.4.5)

<agent>

ɐrmuniɐ dingɐk	harmonium hit	‘to play the harmonium’
dɐmburɐ dingɐk	lute hit	‘to play the lute’
dɔriɐ dingɐk	frame drum hit	‘to play the frame drum’
kɔsiu dingɐk	keyboard hit	‘to play the keyboard’
nɐj dingɐk	flute hit	‘to play the flute’
rəbɔb dingɐk	*rabab* hit	‘to play the *rabab*’

ITR: EMIT SOUND (§6.4.4.6)

<agent>

bɔng dingɐk	crow hit	‘to crow’
qərqərɐ dingɐk	cluck hit	‘to cluck’
zɐng dingɐk	bell hit	‘to ring’

ITR: PUT ON / IN (§6.4.4.7)

<agent>

buqrɐ dingɐk	burqa hit	‘to put on a burqa’
buʈ dingɐk	shoe hit	‘to put on shoes’
diwɔl dingɐk	wall hit	‘to build a wall’
kʊlɐ dingɐk	hat hit	‘to put on a hat’

<agent, goal>

t͡ʃʊɣ dingɐk	reed hit	‘to lay reeds’
turit͡ʃ dingɐk	peeled stick hit	‘to lay sticks’

ITR: ACCUMULATE (§6.4.4.8)

<agent>

qul dingɐk	puddle hit	‘to puddle’

ITR: MOVE (§6.4.4.9)

<agent>

pɐr dingɐk	wing hit	‘to fly’
ʂɐpɐs dingɐk	haste hit	‘to hurry’
təkiɐ dingɐk	lean hit	‘to lean’
xiz dingɐk	jump hit	‘to jump, to slither’

ITR: WEATHER (§6.4.4.10)

avalent

ɐwɔ dingɐk	weather hit	‘to precipitate heavily’
zɔm dingɐk	snow hit	‘to snow heavily’

G. LVCS WITH 'TO BECOME'

INCHOATIVE (§6.4.5.1)

<patient>

ɔb wɔt͡sɐk	water become	'to melt'
d͡ʒɨr wɔt͡sɐk	fixed become	'to heal'
lup wɔt͡sɐk	big become	'to grow'
psjupk wɔt͡sɐk	drowned become	'to drown'
sɐvz wɔt͡sɐk	green become	'to sprout'
sʊtk wɔt͡sɐk	satiated become	'to get full'
wəçʊn wɔt͡sɐk	blood become	'to bleed'
wʊsk wɔt͡sɐk	dry become	'to dry'
xɐtm wɔt͡sɐk	end become	'to end'
xlɔs wɔt͡sɐk	riddance become	'to run out'

<experiencer>

jʊçk wɔt͡sɐk	learning become	'to learn'
pərɐjʃɔn wɔt͡sɐk	worried become	'to get worried'
qɐr wɔt͡sɐk	anger become	'to get angry'

<agent~theme>

d͡ʒɐm wɔt͡sɐk	gathered become	'to gather'
d͡ʒɐng wɔt͡sɐk	war become	'to start fighting'
istɔd wɔt͡sɐk	standing become	'to stop'
pidɔ wɔt͡sɐk	found become	'to appear'
tɐslim wɔt͡sɐk	surrender become	'to surrender'
tir wɔt͡sɐk	passed become	'to pass by'
ʊɻ wɔt͡sɐk	open become	'to open'

<agent~theme, goal>

səwɔr wɔt͡sɐk	horseman become	'to mount, get on'

avalent

ɐwɔ wɔt͡sɐk	weather become	'to clear up'
nɐjd wɔtsɐk	night become	'to become night'

PASSIVE (§6.4.5.2)

<patient, agent>

bərbɔd wɔt͡sɐk	to-wind become	'to be wasted'
gɪrɪftɔr wɔt͡sɐk	caught become	'to be ensnared'
isɔb wɔt͡sɐk	accounting become	'to be counted'
mɐjub wɔt͡sɐk	defective become	'to be crippled'
mɐlul wɔt͡sɐk	disability become	'to suffer amputation'
nigɐdɔr wɔt͡sɐk	protector become	'to be protected'

nʊʐdʊn wɔt͡sɐk	weed become	‘to be weeded’
pidɔ wɔt͡sɐk	found become	‘to be found’
ʃɐjid wɔt͡sɐk	martyr become	‘to be killed’
ʃɐk dəhɔ wɔt͡sɐk	bad prayer become	‘to be cursed’
sɔdir wɔt͡sɐk	issue become	‘to be issued’
tɐkmil wɔt͡sɐk	completion become	‘to be completed’
tɐwlid wɔt͡sɐk	birth become	‘to be born’

H. LVCS WITH LESS FREQUENT LVS

‘TO PUT’

<agent>		
ʃtrʊç kəʈɐk	flour put	‘to hold an engagement’
t͡ʃil kəʈɐk	headscarf put	‘to put on a headscarf’
<agent, theme>		
dɐ kɐf kəʈɐk	in palm put	‘to hand over’
tər vədʊk kəʈɐk	to road put	‘to send away’
<agent, patient>		
tɐdɐw kəʈɐk	foundation put	‘to found (building)’
<agent, goal>		
dɐst kəʈɐk	hand put	‘to shoot’
ɟiʂ kəʈɐk	ear put	‘to listen’
mis kəʈɐk	nose put	‘to chase’
<agent, theme, recipient>		
vul kəʈɐk	smell put	‘to betrothe’

‘TO CARRY’

<agent>		
ðɐj jundɐk	husband carry	‘to marry a man’
dərɨw jundɐk	harvest carry	‘to harvest’
kʊnd jundɐk	wife carry	‘to marry a woman’
<agent, patient>		
t͡sʊ bʊjnən jundɐk	from middle carry	‘to kill’
<agent, theme>		
tɐ prʊt jundɐk	to front carry	‘to advance, to carry out’
<agent, theme, source>		
t͡sʊ dɐstən jundɐk	from hand carry	‘to seize’
<experiencer>		
rənd͡ʒ jundɐk	suffering carry	‘to suffer’
<experiencer, stimulus>		
bɐd jundɐk	bad carry	‘to dislike’

‘TO HOLD’

<agent, patient>

mɐdinɐzɐr wʊdərɐk	consideration hold	‘to consider’

<agent, stimulus>

qisɐ wʊdərɐk	story hold	‘to obey’

<agent, theme, source [‘from’+ABL]>

ðir wʊdərɐk	far hold	‘to avoid, to stay away’

<agent, situation>

tɐsmim wʊdərɐk	decision hold	‘to decide’

avalent

ɐwɔ wʊdərɐk	weather hold	‘to precipitate moderately’
bɔrɪʃ wʊdərɐk	rain hold	‘to rain moderately’
ʂɐçʊk wʊdərɐk	hail hold	‘to hail heavily’

‘TO TAKE’

<experiencer, stimulus>

dust dərzɐk	love take	‘to love’

<agent, theme>

vər dərzɐk	load take	‘to bear’

<agent, stimulus>

jɔd dərzɐk	memory take	‘to learn’

<agent, source [‘from’+ABL]>

jɐrk dərzɐk	work take	‘to use’
səbɐq dərzɐk	lesson take	‘to learn’

‘TO SEE’

<experiencer>

d͡ʒizɔ winɐk	punishment see	‘to experience punishment’
tɐmɔmi zindɐgi winɐk	all of life see	‘to live a long life’
zɐmɐt winɐk	trouble see	‘to experience trouble’

<experiencer, stimulus>

jinɔt winɐk	dream see	‘to dream’
winɔt winɐk	dream see	‘to dream’

‘TO GO’

<agent, goal [NPPOSS]>

skɐ t͡sbɐs rʊɻ͡ʂɐk	on back go	‘to follow’

<stimulus, experiencer [NPPOSS]>

t͡sʊ jɔdən rʊɻ͡ʂɐk	from memory go	‘to be forgotten’

<theme, source [NPPOSS]>

t͡sʊ dɐstən rʊɻ͡ʂɐk	from hand go	‘to be lost involuntarily’

<patient>

t͡sʊ bʊjnən rʊɻ͡ʂɐk	from middle go	‘to pass away’

avalent

bɔrɪʃ rʊɻ͡ʂɐk	rain go	‘to rain’

‘TO COME’

<patient>

d͡ʐuʂ wəzɐjən	boiling come	‘to boil’
sʊrx wəzɐjən	red come	‘to get hot’

<experiencer [NPPOSS]>

qɐr wəzɐjən	anger come	‘to get angry’

<experiencer, situation>

bɐs wəzɐjən	enough come	‘to be able’

‘TO READ’

<agent~goal, stimulus>

dɐrs d͡ʒɔjak	lesson read	‘to study’
kurs d͡ʒɔjak	course read	‘to take a course’
məktɐb d͡ʒɔjak	school read	‘to attend school’
nəmɔz d͡ʒɔjak	ritual prayer read	‘to recite Islamic prayers’

‘TO FALL’

avalent

ɐwɔ plənɐk	weather fall	‘to precipitate lightly
bɔrɪʃ plənɐk	rain fall	‘to rain lightly’
ʂɐçʊk plənɐk	hail fall	‘to hail lightly’
zʊm plənɐk	snow fall	‘to snow lightly’

‘TO BRING’

<agent, patient>

bʊ dɐst wʊzmɐk	to hand bring	‘to acquire’
bʊ d͡ʒɔ wʊzmɐk	to place bring	‘to fulfill’
bʊ wud͡ʒud wʊzmɐk	to existence bring	‘to create

‘TO EAT’

<experiencer>

bɐnɻ jitɐk	stuck eat	‘to get stuck’
xtɔ jitɐk	accident eat	‘to have an accident’
zɐmɐt jitɐk	trouble eat	‘to have trouble’

‘TO SAY’

<agent>

bɐjt çənɐk	song say	‘to sing’
qisɐ çənɐk	story say	‘to tell a story, to speak’

‘TO REMAIN’

<experiencer>

ɐjrɔn wʊrʊt͡ʂɐk	surprise remain	‘to be surprised’
xʊd͡ʒɔlɐt wʊrʊt͡ʂɐk	shame remain	‘to be shamed’

‘TO PULL OUT’

<agent, patient>

nʊk niçindɐk	tip pull out	‘to sharpen (pencil)’
ʂɐj niçindɐk	firing pull out	‘to fire (clay)’

‘TO KNOW’

<experiencer, stimulus>

biqɐdr diʃɐk	without-value know	‘to devalue’
ʃɐk diʃɐk	bad know	‘to despise’

I. LVCS WITH UNIQUE LVS

<agent>		
d͡ʒɛng pərviɐk	war strike	‘to start fighting’
fɐr ɟirɐk	spin turn	‘to turn around’
qisɐ t͡ʃɨpɐk	story pluck	‘to gossip’
zɐmɐt xəʂɐk	trouble pull	‘to work hard’
<patient>		
ɐlɐl wɐzɐk	hibernation fall	‘to hibernate’
<experiencer [NPPOSS], stimulus [‘on’]>		
pəziv θɨwɐk	heart burn	‘to feel compassion’

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