

Twenty-Third International Linguistics Olympiad

Bucharest (Romania), 26 July – 2 August 2026

Individual Contest Solutions

Problem 1. Vowels (V): [i, u, ə, a] ↔ ⟨i, u, e, a⟩.

Consonants (C):

- voiceless occlusives (T): ⟨p, t, c, k, q⟩

← [p, t, c, k, q]

- * before V or Z
- * when lengthened
(in the sequence T.T)

← [p^h, t^h, c^h, k^h, q^h]

- * before S
- * at the end of the word

- voiced fricatives (Z):

[v, ʒ, z, ʁ, ʁ] → ⟨v, l, s, g, r⟩

Between T and Z (in any order) [] is written.

- sonorants (N): [m, n, ŋ, j] ↔ ⟨m, n, ng, y⟩

- voiceless fricatives (S): [f, ʃ, s, x, χ]

→ ⟨v, l, s, g, r⟩

- * after S
- * after T
- * before T

→ ⟨vv, ll, ss, gg, rr⟩

- * between two V
- * between V and N
(in any order)
- * before S

Stress pattern:

- If the first syllable is (C)VC, it is stressed; otherwise, the second syllable is stressed.
- Stress is assigned to every other syllable from the first stressed syllable, except for the last.
- If (C)V is stressed: ${}^1(C_1)V.C_2 \rightarrow \begin{cases} {}^1(C_1)V.C_2 & (\text{if } V = a, i, u) \\ {}^1(C_1)VC_2.C_2 & (\text{if } V = ə) \end{cases}$
- Only in GCY:
... (C)VC. **'(C)V**. (C)V(C)... →
... **'(C)VC**. (C)V. **'(C)V(C)**... (the pattern is reset).

(a)

1.	[¹ məʃ.qu.ʃəʒ.ʒi.ʉχ.ta]	melquleliurta
2.	[qa. ¹ ja:pix. ¹ ka:ni]	qayapigkani
3.	[ta.ʃi:χaq ^h]	tallirraq
4.	[¹ kəx.sa.iʃ.ku.taq ^h]	keggsailkutaq
5.	[¹ cup.ʁa.ʃax.tuq ^h]	cup'gallagtuq

(NS)

(b)

6.	aartartuq	[a. ¹ aχ.taχ.tuq ^h]
7.	akekataki	[a. ¹ kək.ka.ta:ki]
8.	negavgun	[nə. ¹ ʁav.ʁun]
9.	atasuak	[a. ¹ ta:zu.ak ^h]
10.	ner'ciquq	[¹ nəʁ.ci.quq ^h]
11.	alikenritaqa	[a. ¹ ʒi:kən.ʒi:ta.qa]
		[a. ¹ ʒi:.'kən.ʒi.ta:qa]
12.	neqlinrrarmek	[¹ nəq ^h .ʃin.ʃax.mək ^h]

(NS)

(GCY)

Problem 2.

- (a) 1. *kpêdê* — C. *nut that turns black when roasted*
 2. *kpêdêkpêdê* — A. *black*
 3. *kpaapî ntóó* — B. *extremely white*
 4. *kpaapî tp:oo* — G. *white cockatoo chick*
 5. *nkéli tp:oo* — D. *small ship*
 6. *tpile kpaapîkpaapî* — F. *white thing*
 7. *yi yâa taataa* — E. *the tree has red leaves*
 8. *chêêpî mbwii miyó* — M. *two long and thin stones*
 9. *kinikini* — K. *greasy*
 10. *lîmî k:ii* — N. *quickly* (“like lightning”)
 11. *mty:aamty:aa* — P. *sweet* (adjective)
 12. *mty:aa wee* — H. *bee*
 13. *nkéli chêêpî pâa* — I. *chunks of iron*

- (b) 28. *k:ii* —
 • *banana plant*
 • *like, similar to*
 29. *kpaapî* — *white cockatoo*
 30. *kîgha* — *ripe*
 31. *mty:aa* — *honey*
 32. *nkéli dnye* — *English language*
 33. *ngwolo* — *eye*
 34. *kémi kîgha nt:uu* — *ripe mango*

- (d) 35. *kpaapî tp:oo kpaapî tp:oo* — V. (*young humphead wrasse*)
 36. *mbóó* — II. (*sky*)
 37. *mbóó nté* — VI. (*(light) blue* [lit. ‘like the sky’])
 38. *mbóó p:uu nkéli* — IV. (*airplane* [lit. ‘ship in the sky’])
 39. *pê pê* — I. (*millipede*)
 40. *taa* — III. (*red parrot*)

- (e) Basic colour terms (for black, white, red) are formed by reduplication of nouns denoting entities of that colour. Other colours (green, yellow, blue) are expressed through comparative phrases (‘like fresh tree leaves’, ‘like a ripe banana fruit’).

14. *nkéli pi* — J. *European person, foreigner*
 15. *tpile wee* — L. *insect*
 16. *yi mbwii* — O. *stick* (noun)
 17. *kémi nt:uu* — Y. (*unripe*) *mango*
 18. *k:ii miyó* — X. *two banana plants*
 19. *nkéli mbwaa* — Q. *alcoholic drink*
 20. *ngwolo nt:uu* — S. *eyeball*
 21. *mbwaa* — Z. *water*
 22. *mwi pê* — U. *intestinal worm*
 23. *tpile pê k:ii kîgha nt:uu k:ii* — AA. *yellow snake*
 24. *pi mbwii* — V. *tall and slim person*
 25. *pi ntóó* — R. *corpse*
 26. *tpile pê yi kuu yâa k:ii* — T. *green snake*
 27. *yi pâa* — W. *tree trunks*

- (c) BB. (*his*) *son* — *tp:oo*
 CC. *green* — *yi kuu yâa k:ii*
 DD. *fat, grease* — *kini*
 EE. *fresh, raw* — *kuu*
 FF. (*unripe*) *fruit* — *nt:uu*
 GG. *black person* — *pi kpêdêkpêdê*
 HH. *Rossel Island* — *Yéli*

Problem 3. Noun plurals are not derived from the singular by a consistent pattern.

Pronouns:

- ki=** – 1st person sg.
- kia=** – 2nd person sg.
- nu=** – 3rd person sg.

Demonstrative pronouns (D):

- iina** – sg.
- iipi** – animate pl.
- imi** – inanimate pl.

Verb:

- stem**-kura**: realis (past tense)
- stem**-rii**: irrealis (future tense)

Word order (realis):

- $S V \begin{pmatrix} O (IO) \\ (IO) O \end{pmatrix}$ (S – subject, V – predicate, O – object, IO – indirect object)
- D N (N – noun)
- X Y (X – possessor, Y – possessed)
- D_X Y X

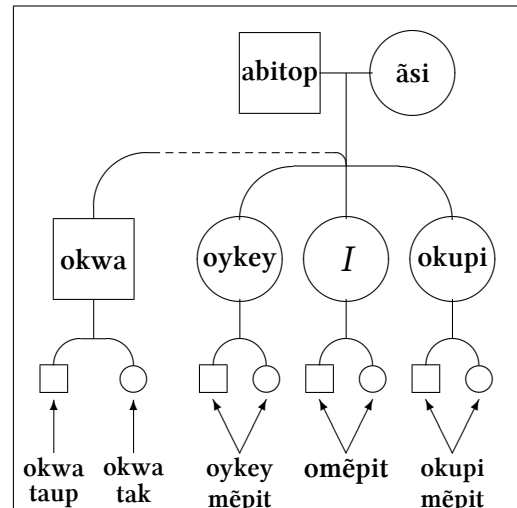
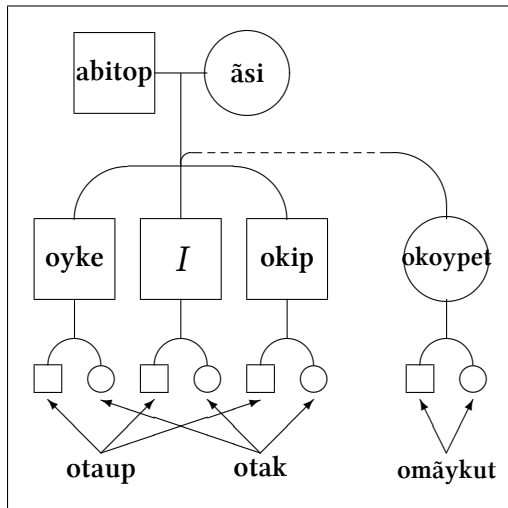
Word order (irrealis): the noun phrase that immediately follows the verb is moved in whole or in part.

realis	→	irrealis
S V N	→	S N V
S V X Y	→	S X Y V
S V D N	→	S D V N
S V D _X Y X	→	S D _X Y V X
(not given in this problem)	→	S D _Y V X Y
(not given in this problem)	→	S D _Y V D _X Y X

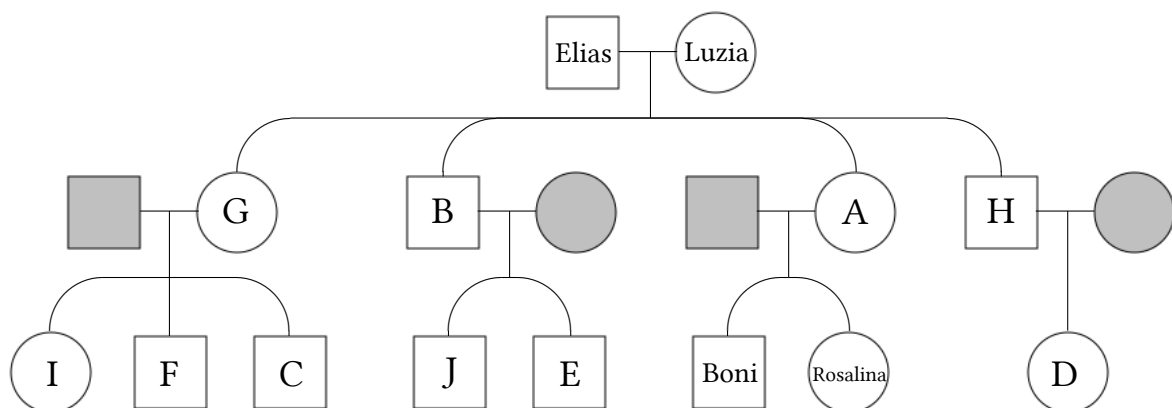
- (a) 17. **kia=iipi siwīrarii mīisaji paajuuyaapi** – *You_{sg} will visit these teachers of the woman.*
 18. **nu=nikikura Leo paapaaja** – *They_{sg} saw Leo's fish.*
 19. **ki=iina masiitirii mīisaji iimina** –
I will sell this canoe of the woman.
I will sell this woman the canoe.
 20. **ki=iipi kariinirii iina mira ikwani** – *I will care for these children of this man.*
- (b) 21. *You_{sg} bought the canoes of these children.*
kia=masiikura iipi iiminaka mira
 22. *You_{sg} will break the rope of the teacher.*
kia=paajuuyaana iiyii isikirii
 23. *I will buy the house of these women.*
ki=iipi iita masiirii iitimira
 24. *They_{sg} will sell Ema these books.*
nu=iimi masiitirii simiimiya Ima
nu=Ima masiitirii iimi simiimiya
 25. *I will repair this canoe of these men.*
ki=iina irikatajuurii iipi iimina ikwaniwiya

Problem 4.

older brother $\equiv$ older male cousin older sister $\equiv$ older female cousin
younger brother $\equiv$ younger male cousin younger sister $\equiv$ younger female cousin



(a)



(b) Boni > Rosalina > 10 (D) > 5 (I) > 6 (F) > 8 (J) > 9 (E) > 7 (C)

- (c) (i) oykey mēpit
(ii) oykey
(iii) okoypet
(iv) okip
(v) okwa
(vi) otak

- Word order: time adverb verb.
- Aspect/Tense:

aspect	imperfective (action is extended in time)	perfective (action is short-lived)
tense	– non-past (<i>I am calling them now</i>) – past (<i>I was calling them a week ago</i>)	– recent past (<i>I called them yesterday</i>) – past (<i>I called them a week ago</i>)

- Structure of the verb form:

1. object:

aspect	imperfective	perfective
1st person sg.	wo-	zw-
1st person pl.	n-	nzn-
2nd person pl. } 3rd person pl. }	e-	th-

3. root:

aspect	imperfective	perfective
<i>see</i>	-mar-	-mar-
<i>return</i>	-brig-	-brim-
<i>hold</i>	-fath-	-faf-
<i>meet</i>	-wagr-	-waf-
<i>call</i>	-bräkn-	-s-

2. aspect = perfective: -ä- (-äCa- > -eCa-; C is a consonant)

4. aspect = imperfective: -w-

5. tense = past (*a week ago*): -a-

6. subject:

1st person sg.	-é (-aé > -a)
1st person pl.	-e (-ae > -ake)
2nd person pl. = 3rd person pl.	-th (-wth > -wrth)

(a) 15. You_{pl} held me yesterday. kayé zɛwəfath
16. I called you_{pl} a week ago. nümä thāsa
17. You_{pl} are holding me now. zena wofathwrth
18. They met us a week ago. nümä nznewafath

(b) 19. nümä nbrigwath You_{pl} were returning us a week ago.
They were returning us a week ago.
20. kayé thefafé I held you_{pl} yesterday.
I held them yesterday.
21. nümä emarwa I was seeing you_{pl} a week ago.
I was seeing them a week ago.
22. kayé nznäbrimth You_{pl} returned us yesterday.
They returned us yesterday.