Roadmap

release stoppers

Things to Test

- check that changes to S regexs don't break too much.
- Why do bad sound files play OK?
- figure out why mainloop is still running on window closure

Simplify (non-OOP related)

- on import, check for entries without:
- citation, copy over from lexical-unit (all langs)
- gloss, copy over from definitions (truncate, all langs)
- remove references to definition, lexeme?
- Do I want to ultimately be modifying lexeme form?
- check how many of the urls in lift.py I'm actually using, consider moving them to a method for each —
- maybe call get with a url parameter?
- kwarg for node or not, text or not, attr?

Migrate further toward OOP

- Consider making the following objects?
    - ErrorWindow class (tryNAgain, maybesort …)
    - tables (base on buildXLPtable(self,parent,caption,yterms,xterms…))
    - languages
    - ps-profile slices
    - check name - frame
    - sense (create these objects in threads)
    - group
    - runwindow
    - groupselected should be an attribute of a sense?
    - lift-form? include attributes lexical, citation, root, affix(es)?
    - this will need some treatment by language, for dictionaries with forms in multiple languages.
    - lift-field?
    - lift-node?
    - lift-example?
- Think through guessing and next functions, and maybe verify?
    - Sometimes guessing is appropriate, especially current is not valid
        * and not necessarily the same as next (i.e., not current)

1

* nor verify, which makes valid, but doesn't change if already valid.
  – These should probably all go together, with common [arg,argprioritylist] parameters

In Process (fix)

- go to https://fontforge.org/docs/scripting/python/fontforge.html to see if we can pull contour tone staves
- add mini keyboard of common symbols (class, to add to Entry)
- fn to change tone frame name, everywhere where needed
  – toneframes.py
  – verification file
  – example nodes
  – verification nodes
- make verify window go away when last button is clicked
- Set up schema to test line expenses on boot time, for each line
  – this-then, store then = this
  – determine costliest lines, which can be threaded
- Set up schema on largest (time) expenses, to do any of (to test real world difference, as well as to have available for quick changes, if needed later):
  – as is
  – threaded
  – multiprocessed
- freeze header on status scroll (not currently practicable, without serious reworking of the table/scroll)
- don't write ps = 'Invalid' to profilesbysense
- make settonevariablesbypsprofile take arguments ps, profile
- Frame object has no attribute 'skip'
- reduce unnecessary self.gettonegroups() calls
- make "next frame" do checkcheck
- test for table content before starting it; if all zeros, skip
- Don't die on no count for table
- fix analang detection problem?
- make recordbuttons pass recordcheck, which verifies that settings are plausible.
- include checks on empty or repeated XLP nodes
- convert basic report to XLP table function
- set up function to change tone sort group names (to transcriptions/meaningful names)
  – give buttons for each tone letter, plus back and enter
  – give scrolling frame of buttons for framed words in the group, clickable to play to make the transcription
- make status table scroll (in both directions?)
- Look at tkinter tabs (for status page?)
- add progress of recording (on its own tab?)

For Future Versions

- add interpretation of glottal stop into sdistinctions.
- fix zip problem on Windows: "OSError: [Errno 22] Invalid argument: 'log_-:.7z' "
- extra space being added for None forms in Frame construction
- Sort out why not all nouns show in ad hoc selection list.
- functions that depend on a slice of data:
    - require renewal of certain variables before running
    - careful iterating over them
    - distinct from other functions, which iterate over multiple slices
- make nextps and nextprofile (and nextframe?) reference most popular *unfinished* ps-profile combo
- fix skip button
- reduce calls to gettonegroups; just after check name is set
- confirm that all variable calls that are only set on frame/ps-profile switch are stored, and available on open.
- don't write blanks to verification file
- for next ps/profile, move to modified settings (if there), rather than re-figuring each time (this costs nontrivial time).
    - if nothing has changed, there's no reason to waste that time.
    - we can refigure once per ps change? To hold it longer we would need to store it in a dict keyed by ps.
- propagate exitFlag to the rest of the check
- better document skip function
- improve status table with buttons
    - make 'next' buttons on the end of each axis in the table.
    - make "hide" buttons for each header (x and y)
    - make "show all" button at the origin
- commit diffs to hg on closing (or when?)!
    - think through which settings should be shared:
        * profile data?
        * verification status
        * ad hoc groups?
    - and which shouldn't
        * check defaults
- fix windows minimization problem (new with availxy)
- consider adding ps = None, profile = None, and name = None to scripts used in iterating across these variables, so they can be sent as variables, rather than changing self.{ps,profile,name}, given that these changes will now come at a greater cost.
    - all changes to self.{ps,profile,name} should come through self.set()
    - avoid unforeseen effects of self.x = y calls
    - We need to distinguish between user changes to these variables, and changes from iteration under the hood, which should be through arguments of local variables.
    - search for any script wrapped by psori = self.ps type statements, amend.

* settonevariablesbypsprofile
* updatestatus
* makestatusdict
* makeadhocgroupsdict (done)
* sortingstatus
* gettonegroups
* getframestodo

- move all ad hoc changes by attribute (e.g., self.ps = x) into set (to generalize it)
- Make function to manually refresh status file, don't do it otherwise
  – this is getting cumbersome, like the profile data
- Remove None from status list of profiles –this should never go there.
  – define self.profile before writing to status?
- Reduce checkcheck calls, and/or separate table refresh from northwest status?
  – or make sorting add to stats files, so we don't need to recompile them but when changing ps-profile or frame
  – make wait window work in the mean time
- Find out how Chorus decides what files to pick up, make sure our config files are getting in.
- move config files to aztconfig directory?
- look at how to generalize tone sorting, joining, etc. process.
- bring new documentation pages:
  – What A→Z + T will and won't do for you
  – The Cyclical process of analysis
    * incremental
    * complete cycles
- get dependencies offline for pyaudio
- don't crash on invalid sample rate; clear if not valid.
  – use is_format_supported on parameters, reset, or limit options?
- When making record button:
  – remove links to the *wrong* sound file
  – test for presence of currently linked file (i.e., not recorded in AZT), give play buttons
  – widen "Do" menu item (give all a minimum width)

For some time

- set up mail of bug report (better than WeSay)
- look into having hg commit changes to verification status file
  – don't track checkdefaults? (make per user file?)
- Set means for user to check verification stage again.
  – Once done, there is currently no AZT way to redo it.
- Look up how to get real required heights and widths, availablexy isn't working correctly.
- fix reconfigure scrolling window frame problem (remove need for if self.configured < 1:)

- constrain frames with less data, to only scroll as needed.
- add test for resolutionsucks, implement smaller font theme
- include test to see if a tone analysis has been run since latest triage;
  - if not run the report
  - For verification window, if last example is selected (all gone), exit
    - don't ask for nonsensical "these are all the same".
- ways to change a frame after the fact... this seems to be a common problem
- ?put next undone buttons in dictionary recording pages, too
- for addframe, add button/menu to allow viewing all frames already done, to help with consistency across frames.
- ?cycle through tone groups to record based on volume of the group.
- done?   Update regex functions a=to allow for C(V)C\1, CVC(V)C\1, and C(V)C\1C\1, for vowel and consonant reports and checks

Next Features

- add C and V sorting (and CV?)
- model form construct with fields for CV info and tone info, which may contain variables (HAB,CONT) in addition to H, L, etc.
- proper modeling of the relationship between lx and lc
  - show pronounceable words only
  - build words on the basis of roots —should some frames use lc, e.g., if affixes are unpredictable?

Some Day, if possible

- transition to gloss only (no definition references)
  - make docs specify gloss should be populated (maybe instructions to bulk copy?)
- Look into tkinter tabs to separate out different task sets, like
  - sorting v recording
  - PS1 v PS2
  - C v V v T
  - this ps-profile slice, v whole database work
- rectify (scrolling) Frame redundant windowsize fn
- have automatic choice of ps-profile go through all defined frames, then next most populous ps-profile
- include tone grouping in recording pages?
- XLP export (these are not likely to happen)
  - run dotexpdf (once you figure out where that is) to generate pdf?
  - run script to generate html?
  - figure out window specific variations (with Andy?)
- set tone report to ignore NA, if there is only one other value in that position (given the other values for the other frames).

- Fix 'ŋ' display problem in entry fields in MS windows (working fine in Linux)
  [x] noted issue in USAGE.md
- Make Wait window show background color and label message in MS Windows (working fine in Linux)
- put `setdefaults.py` into Check class
- distinguish between lc and lx
    - make CV report only reference lx field
    - make docs specify the difference, start with lc references (maybe instructions to bulk copy?)

For specific databases

```
- fix key 7 problem for sxw
-? figure out why multiple fuŋ entries aren't showing for recording on bfj
    - '6e2a67cb-6695-4536-bc55-423fad4f019b',<+
    - '7cdcddfc-5b9f-44bf-bfe5-d5ce164720cd',
```

Documentation

- Add what and why pages in different places, with rationales and instructions specific to context?