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### ADDING COMPOSITE SOUNDINGS TO AWIPS

#### AWIPS localization

- Create a new file directory to hold the composite soundings:
  ```plaintext
  /data/fax/point/radio/archive
  ```

- Add the depot keys and associated data keys to the file.

- Add a unique depot key for each sounding.

- Add a unique data key for each sounding.

- Modify the Upper Air menu. Edit the `UW-aa.aa` file in the
  ```plaintext
  /awips/fax/data/localization/UW-aa
  ```

- Add the depot and associated data keys to the file.

#### Obtain soundings in N-SHARP archive format

- The NWS Storm Prediction Center maintains a
  7-day archive of observed soundings at
  [http://www.spc.noaa.gov/oper/soundings](http://www.spc.noaa.gov/oper/soundings)
  on an experimental basis.

- From the website, a sounding can be downloaded in N-SHARP Archive format, as
  a text file.

- The N-SHARP to AWIPS application can be used to convert the text file to NetCDF format,
  for viewing in AWIPS.

### COMPARISON OF SOUNDINGS IN AWIPS AND N-SHARP

- AWIPS display of the KJXR composite soundings for the 6E flow regime.
- N-SHARP display of the composite sounding from KJXR for the 6E flow regime.

### OBTAINING SOUNDINGS IN N-SHARP ARCHIVE FORMAT

- Choose an archived sounding from N-SHARP.
- Choose the desired data format (NetCDF or ASCII).
- Download the sounding data file.
- View the sounding data in AWIPS.

### REFERENCES

### Displaying Composite and Archived Soundings in the Advanced Weather Interactive Processing System

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Unclassified, Unlimited

**Abstract:**
This presentation describes work done by the Applied Meteorology Unit (AMU) to add composite soundings to the Advanced Weather Interactive Processing System (AWIPS). This allows National Weather Service (NWS) forecasters to compare the current atmospheric state with climatology. In a previous task, the AMU created composite soundings for four rawinsonde observation stations in Florida, for each of eight flow regimes. The composite soundings were delivered to the NWS Melbourne (MLB) office for display using the NSHARP software program. NWS MLB requested that the AMU make the composite soundings available for display in AWIPS. The AMU first created a procedure to customize AWIPS so composite soundings could be displayed. A unique four-character identifier was created for each of the 32 composite soundings. The AMU wrote a Tool Command Language/Tool Kit (Tcl/Tk) software program to convert the composite soundings from NSHARP to Network Common Data Form (NetCDF) format. The NetCDF files were then displayable by AWIPS.

**Subject Terms:**
- flow regime
- rawinsonde
- Advanced Weather Interactive Processing System (AWIPS)
- NetCDF