

Overview

This document describes how to create pre-localization radar specific RPS lists which will allow localization to correctly recreate the radar RPS lists. These pre-localization RPS lists should be stored in the `/awips/fxa/data/localization/LLL` directory where **LLL** is the AWIPS localization identifier for your AWIPS system. The file name for the clear air RPS list will have the file name `/awips/fxa/data/localization/LLL/LLL-RRRR.clear-air` where **LLL** is the AWIPS localization identifier for your AWIPS site and **RRRR** is the 4 letter identifier for the radar. The file name for the storm RPS list will have the file name `/awips/fxa/data/localization/LLL/LLL-RRRR.storm` where **LLL** is the AWIPS localization identifier for your AWIPS site and **RRRR** is the 4 letter identifier for the radar.

Introduction

The site specific/radar specific RPS lists are recreated by the `-auxFiles` option in the `mainScript.csh` script. The `-auxFiles` option uses the generic `/awips/fxa/data/KXXX.clear-air` file to recreate the radar specific clear air RPS lists in the `/data/fxa/radar/lists` directory. The `-auxFiles` options uses the generic `/awips/fxa/data/KXXX.storm` file to recreate the radar specific storm RPS lists in the `/data/fxa/radar/lists` directory.

For example, AWIPS site BUF has a dedicated connection to 2 radars: the KBUF radar and the KTYX radar. When an `./mainScript.csh -auxFiles` localization is run on the BUF AWIPS system, the generic `/awips/fxa/data/KXXX.clear-air` file is used to recreate the radar specific `/data/fxa/radar/lists/KBUF.clear-air` and the `/data/fxa/radar/lists/KTYX.clear-air` RPS lists. When an `./mainScript.csh -auxFiles` localization is run on the BUF AWIPS system, the generic `/awips/fxa/data/KXXX.storm` file is used to recreate the radar specific `/data/fxa/radar/lists/KBUF.storm` and the `/data/fxa/radar/lists/KTYX.storm` RPS lists.

Most AWIPS sites have customized the site specific/radar specific RPS lists so it is undesirable to allow the `./mainScript.csh -auxFiles` localization to use the generic `KXXX.clear-air` and `KXXX.storm` files as the source files creating radar specific RPS lists.

The KBUF radar is an NWS radar and the BUF AWIPS system has a LAN-to-LAN interface to the KBUF radar. The LAN-to-LAN interface allows the BUF AWIPS system to include up to 65 products in the RPS lists which are sent to the KBUF radar.

The KTYX radar is a DoD radar and the BUF AWIPS system has an X.25 interface to the KTYX radar. The line speed of this X.25 interface is 14.4K which allows BUF AWIPS system to include up to 31 products in the RPS lists which are sent to the KTYX radar.

BUF's RPS list for the KBUF radar will be different than the RPS list for the KTYX radar because the radar interfaces support a different maximum number of products. The KBUF LAN-to-LAN interface supports up to 65 products while the KTYX X.25 interface only supports up to 31 products. Additionally, the KBUF LAN-to-LAN connection is fast enough to support the 8-bit radar products therefore BUF would want to include the 8-bit Reflectivity Array and 8-bit Velocity Array products in the KBUF.storm RPS list. The KTYX X.25 interface is not fast enough to support the 8-bit radar products therefore BUF would want not want to include the 8-bit Reflectivity Array and 8-bit Velocity Array products in the KTYX.storm RPS list.

Creating radar specific pre-localization RPS lists

To create radar specific pre-localization RPS lists, the radar specific RPS lists in the /data/fxa/radar/lists directory will be copied to the /awips/fxa/data/localization/LLL directory. The site/radar specific /data/fxa/radar/lists/**RRRR.clear.air** file will be copied to the /awips/fxa/data/localization/LLL/**LLL-RRRR.clear.air** file. The site/radar specific /data/fxa/radar/lists/**RRRR.storm** file will be copied to the /awips/fxa/data/localization/LLL/**LLL-RRRR.storm** file. The generic format of the copy commands would be:

```
cp -p /data/fxa/radar/lists/RRRR.clear.air /awips/fxa/data/localization/LLL/LLL-RRRR.clear-air
cp -p /data/fxa/radar/lists/RRRR.storm /awips/fxa/data/localization/LLL/LLL-RRRR.storm
```

For example, BUF has customized the /data/fxa/radar/lists/KBUF.clear-air and the /data/fxa/radar/lists/KBUF.storm files to meet their requirements for the KBUF radar. BUF would issue the following commands on all servers and workstations as the **fxa** user to create their KBUF pre-localization RPS lists:

```
cp -p /data/fxa/radar/lists/KBUF.clear.air /awips/fxa/data/localization/BUF/BUF-KBUF.clear-air
cp -p /data/fxa/radar/lists/KBUF.storm /awips/fxa/data/localization/BUF/BUF-KBUF.storm
```

Once the /awips/fxa/data/localization/BUF/BUF-KBUF.clear-air file is established, the **./mainScript.csh -auxFiles** localization will use the BUF-KBUF.clear-air file to recreate the /data/fxa/radar/lists/KBUF.clear-air RPS file. Once the /awips/fxa/data/localization/BUF/BUF-KBUF.storm file is established, the **./mainScript.csh -auxFiles** localization will use the BUF-KBUF.storm file to recreate the /data/fxa/radar/lists/KBUF.storm RPS file.

BUF has customized the /data/fxa/radar/lists/KTYX.clear-air and the /data/fxa/radar/lists/KTYX.storm files to meet their requirements for the KTYX radar. BUF would issue the following commands on all servers and workstations as the **fxa** user to create their KTYX pre-localization RPS lists:

```
cp -p /data/fxa/radar/lists/KTYX.clear.air /awips/fxa/data/localization/BUF/BUF-KTYX.clear-air
cp -p /data/fxa/radar/lists/KTYX.storm /awips/fxa/data/localization/BUF/BUF-KTYX.storm
```

Once the /awips/fxa/data/localization/BUF/BUF-KTYX.clear-air file is established, the **./mainScript.csh -auxFiles** localization will use the BUF-KTYX.clear-air file to recreate the /data/fxa/radar/lists/KTYX.clear-air RPS file. Once the /awips/fxa/data/localization/BUF/BUF-KTYX.storm file is established, the **./mainScript.csh -auxFiles** localization will use the BUF-KTYX.storm file to recreate the /data/fxa/radar/lists/KTYX.storm RPS file.

It is important that the /awips/fxa/data/localization/LLL/LLL-RRRR.clear-air file and the /awips/fxa/data/localization/LLL/LLL-RRRR.storm file be updated on all servers and workstations. When installing OB1 software, the localization is run on the ds1 server and the resulting localization files are pushed from ds1 to the remaining servers and workstations. When installing OB2 software, the localization is run on the lx1 server and the resulting localization files are pushed from lx1 to the remaining servers and workstations.

Keeping the pre-localization RPS lists accurate

If the default RPS lists are modified by using the procedure in the System Managers Manual 16.1, save a copy of the updated RPS lists to the pre-localization RPS list file. SMM 16.1 provides instructions for updating the default /data/fxa/radar/lists/RRRR.clear-air and the /data/fxa/radar/lists/RRRR.storm RPS list files using the RPS List Editor. After the default RPS lists are updated, the corresponding /awips/fxa/data/localization/LLL/LLL-RRRR.clear-air and /awips/fxa/data/localization/LLL/LLL-RRRR.storm files should also be updated on all servers and workstations. The generic format of the copy commands would be:

```
cp -p /data/fxa/radar/lists/RRRR.clear.air /awips/fxa/data/localization/LLL/LLL-RRRR.clear-air
cp -p /data/fxa/radar/lists/RRRR.storm /awips/fxa/data/localization/LLL/LLL-RRRR.storm
```

It is important that the /awips/fxa/data/localization/LLL/LLL-RRRR.clear-air file and the /awips/fxa/data/localization/LLL/LLL-RRRR.storm file be updated on all servers and workstations.

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