Hazard Services River Flooding Scenario

A fictional river forecast point HUSKR exists in the OAX Hydro database, for Osborne Creek at Lincoln, located in Johnson county, NE. You can use this point to create simulated river flood products in Hazard Services in practice mode.

- Make sure AWIPS is in Practice Mode and Start CAVE. (If already in Practice Mode, you can skip to the next red text instruction).

Close all CAVE sessions.

Applications > AWIPS Menu > AWIPS Startup Menu > Test Mode Control Program > Change Mode to Practice (In House)

Start CAVE (Make sure CAVE has orange borders, otherwise you are NOT in practice mode). Load the Hydro Perspective

- Open Hazard Services in the Hydro Perspective

- When not in use, the fictional river point HUSKR is set to Inactive. Before starting, set the site to Active.

Hydroview > HydroApps > Hydro Database Manager > password is: water > find HUSKR > Select HUSKR > Location > Modify Location > uncheck “Inactive” > Apply

- Load in the fictional river data for the HUSKR point

These steps will load a forecast for minor flooding well into the future...a potential “River Flood Watch” event. Open an AWIPS terminal window from the AWIPS Applications menu > Favorites > Terminal (move it aside and leave it open for later commands) Type the following commands exactly.

cd /localapps/runtime/hydro/training/ <ENTER>
./clear.ksh HUSKR <ENTER>
./send.csh 21 HUSKR <ENTER>

HUSKR Info: Action stage: 21.5 Minor stage: 23 Moderate stage: 24 Major stage: 26

Forecast Number	Scenario	Short/Long	Crest
11	Minor	S	23.9
12	Moderate	S	25.2
13	Major	S	26.8
14	Below FS	S	22.9

21	Minor	L	23.9
22	Moderate	L	25.2
23	Major	L	28.0
24	Below FS	L	17.8
41	Below FS	L	21.5
42	Below Action	L	20.5
43	Way Above Major	L	31.5

Use short term scenarios to issue a warning, and use long term scenarios to issue a watch.

- Refresh the Hydro Perspective

Note: It will take about 30 seconds for fictional data to show up in the Hydro database. Fictional observed data for HUSKR will be inserted into RG:RZ:Z and fictional forecast data will be inserted into HG:FF:Z.

Hydroview > MapData > Refresh Data and the HUSKR point should now be visible in **Johnson county.**

- Create a River Flood Watch product in Hazard Services

Run the River Flood Recommender. Select “Watch”. Select “None” to clear, and then manually click the box for “Salt Creek”. Run.

- After issuing the River Flood Watch, send updated river forecast information to support issuance of a River Flood Warning (Minor stage beginning soon)

In the AWIPS terminal window opened previously:
./clear.ksh HUSKR
./send.csh 11 HUSKR
Wait about 30 seconds. Refresh the Hydroview Perspective. Right-click on the HUSKR point, choose “Create Hazard”[1], and proceed through the steps to update the flood warning.

Double left click on the HUSKR point to select, then right click and choose “Create Hazard”[1] to run the River Flood Recommender. Proceed through the Hazard Services steps to create and issue the appropriate river flood warning product.

- After issuing the warning for minor flood stage, to go to moderate stage in the scenario:

In the AWIPS terminal window opened previously:
./clear.ksh HUSKR
./send.csh 12 HUSKR

Wait about 30 seconds. Refresh the Hydroview Perspective. Right-click on the HUSKR point, choose “Create Hazard”[1], and proceed through the steps to update the flood warning.

- (OPTIONAL) After issuing a warning for moderate flood stage, to go to major stage in the scenario:

In the AWIPS terminal window opened previously:
./clear.ksh HUSKR
./send.csh 13 HUSKR
Wait about 30 seconds. Refresh the Hydroview Perspective. Right-click on the HUSKR point, choose “Create Hazard”[1], and proceed through the steps to update the flood warning.

- To go back to below Flood Stage in the scenario:

In the AWIPS terminal window previously opened:
./clear.ksh HUSKR
./send.csh 14 HUSKR
Wait about 30 seconds. Refresh the Hydroview Perspective. Right-click on the HUSKR point, choose “Create Hazard”[1], and proceed through the steps to cancel the flood warning.

- When finished practicing with Hazard Services make sure to clear out the HUSKR data point in the database.

In the AWIPS terminal window previously opened:
./clear.ksh HUSKR

- Return AWIPS to Operational Mode and set the site HUSKR back to Inactive.

Close the terminal window.

Hydroview > HydroApps > Hydro Database Manager > password is: water > find HUSKR > Select HUSKR > Location > Modify Location > check “Inactive” > Apply

Close all CAVEs.

Applications > AWIPS Menu > AWIPS Startup Menu > Test Mode Control Program > Change Mode to Operational

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- Miscellaneous Scenario Notes

[1]You can’t run the “Full” River Recommender in Hazard Services for the point HUSKR, but you can run the “Lite” version by right-clicking on the point in Hydroview and choosing “Create Hazard”.

When creating the text product in Hazard Services for the HUSKR point, you will get a product generation error dialog that states “No River Hazard Polygon for HUSKR”. This is normal for this scenario, click OK to continue. DJP may add a polygon to eliminate this warning.

The template for the Hydrologic Outlook needs a lot of work. In its current form, the text output for an outlook will need significant hand editing.

At this time, hydrologic statements can only be issued when combined with other flood products and cannot be issued on their own.

More Hazard Services information can be found at the VLAB website. Or, right-click and hold over the Hazard Services Legend in CAVE in AWIPS, choose “Reference on Product”, then click on the Hazard Service Reference link in the Firefox Web Browser.