

## Hazus 3.2 – Additional Functionality & Defects

### Flood Model:

- The User Defined Facilities Report under Results à Summary Reports was updated so that losses now display in the \$1000s, instead of actual dollars as before
- Content values and resulting losses for UDFs are now based on user-supplied input for contents
- A glitch caused by the apostrophe in O'Brien County, IA was fixed to remove an error thrown in the Flood Specific Occupancy Mapping dialog
- The Agriculture Exposure Report now populates correctly with results, instead of showing blank as before
- Intermittent issues with SQL locking and denying access to some files were addressed; this should reduce errors or crashes within the Hydrology and Hydraulics analysis
- All reports were upgraded to Crystal Reports 2011 and enhanced to include updated Hazus logo graphics. The Global Summary Report was further enhanced to include graphical representations of results
- Census blocks with a Median Year Built value of zero are now producing flood loss results using updated state data

### Earthquake Model:

- The Debris Summary Report now opens correctly. Previously, some users saw a blank Fire Following Earthquake report
- All reports were upgraded to Crystal Reports 2011 and enhanced to include updated Hazus logo graphics. The Global Summary Report was further enhanced to include graphical representations of results
- A new hazard interface was added to the Earthquake Scenario Wizard to allow direct import of USGS ShakeMap products with an internet connection.

### Hurricane Model:

- All reports were upgraded to Crystal Reports 2011 and enhanced to include updated Hazus logo graphics. The Global Summary Report was further enhanced to include graphical representations of results

### CDMS and Data Changes:

- Import issues to the California state database were fixed
- All state data has been updated to include a value for the Median Year Built field based on the methodology described in Appendix C.
- Study region aggregation was failing for places where <null> values were present in the BackupPower field; a default value of "0" was added instead of <null>
- For user data in a study region, Hazus limits the number of records visible at one time. This limit is set to 100,000 in Hazus 3.2. If you need to change this default setting to a higher value, use the following steps:

1. Navigate to C:\Program Files (x86)\Hazus-MH and locate the file settings.xml
2. Create a copy of this file with a new name (example: settingsOriginal.xml) and save it in a separate location
3. Open settings.xml in Notepad or XML Editor. Wordpad is not supported
4. Search for the settings for RowLimit, and change the limit to your desired number of records (in the screen shot, the value is changed to 1,000 viewable records)



The screenshot shows a portion of an XML file with the following content:
   
<RegionsFolderPath>C:\HazusData\Regions\</RegionsFolderPath>
   
<RegionVer>151515</RegionVer>
   
<RowLimit>1000</RowLimit>
   
<ServerName>IBM700-R90HR3KC\HAZUSPLUSRV</ServerName>
 The 'RowLimit' element and its value '1000' are highlighted with a red rectangular box.

5. It is important to note that tampering with XML settings can permanently corrupt Hazus, and users make these changes at their own risk. Changing XML settings is not recommended or supported by the Hazus program. If Hazus does not work properly after editing settings.xml, please re-install Hazus from the MSC download package
- Due to ongoing issues with ArcGIS and recent changes made to CDMS import capability, the option to import MDB format UDF databases through the study region is no longer supported. Users wishing to import UDF data directly to the study region without CDMS must now convert their MDB file to a feature class using ArcCatalog
  - Major enhancements were made to CDMS data import capabilities:
    - Polyline data can now be imported to study regions through CDMS. Users will need to select the “life line” radio button on the home screen for to make sure of polyline import
    - UDF import to the UDF fields in the state databases is now supported by CDMS. Users wishing to use UDF in their study regions are advised to import the UDF through CDMS, then aggregate a study region, rather than using the UDF import options within the individual study regions
    - Auto-calculation of four required fields was added to CDMS, along with the option to edit the values produced by CDMS. This eases the import process for external data sources, such as HSIP, and improves the quality of imported data. For a listing of the fields and how they are calculated, see Appendix A
    - AEBM inventory data can now be imported through CDMS, provided the data belongs to one of the 16,000 profiles. CDMS will automatically generate your profile name based on the inventory data you input. Profile import and custom profile creation is not supported at this time. Hazus provides over 16,000 pre-populated profiles for imported AEBM data
    - Before the data is pushed to the state database, a user may edit the values in the final table. A final validation process is then conducted on the data to ensure it does not corrupt the state database.

## Known Issues

- A latent defect exists in the Hazus flood model which prevents Hazus from appropriately determining whether a riverine or coastal damage function should be used for a user-defined facility (UDF) in a combined riverine-coastal or coastal-only scenario. When working in coastal regions, an incorrect default damage function will be applied to an individual facility.

Workaround:

- Determine the correct damage function ID (3-digit unique identifier) from the damage function library according to the UDF characteristics, and whether a riverine or coastal hazard is being applied. Specify the damage function ID in the provided column within the UDF data entry window. Confirm the specific occupancy, number of stories, and foundation type (which indicates whether a basement is present) of the damage function matches that of the UDF.
- CDMS users at the FEMA's Emergency Management Institute (EMI) and users with similar workstation security settings may be unable to export to Excel. Please contact the Hazus Help Desk for a workaround: [hazus-support@riskmapcds.com](mailto:hazus-support@riskmapcds.com)
- The table below lists the high priority latent defects which were identified during development or testing of 3.2. The term "latent" refers specifically to a defect that pre-existed and is reproducible in previous versions of the Hazus software (Hazus 3.1 or earlier). This is not a complete list of open defects in Hazus; however, users should be aware of these high-priority issues. Each item will be reviewed and prioritized to be addressed in later releases.

ID	Description	Functional Area
18969	Pipeline data does not export correctly from CDMS; no spatial data is created in the export	CDMS
18997	When running a riverine analysis for Hawaii, all reaches are problem reaches	Flood
19008	UDF analysis for coastal-only flood study regions will use riverine damage functions. To avoid this, use the workaround provided earlier in this section	Flood
18868	In a probabilistic hurricane analysis, wind speeds and building results decrease for the 1000-year return period compared to other return periods. The 1000-year event should have the highest wind speeds and worst damage	Hurricane
18893	Probabilistic hurricane analysis for Hawaii does not work.	Hurricane
18999	Losses to medium and large hospitals are disproportionately larger than losses for small hospitals	Hurricane
19041	New mapping schemes for essential facilities in hurricane are not saved, or applied to the individual facilities	Hurricane
19050	Damage to manufactured housing following a hurricane is less than that of more sturdy structures	Hurricane
19055	The Deep Water Surge option for surge analysis fails for user-defined or Hurrevac storms	Hurricane
XXXXX	Losses due to business interruption are not being calculated correctly.	Flood