



## **DATABASE UPDATES**

- ✘ Over 25,000 crop management templates in 77 of 78 crop management zones in the Continental US, Caribbean, and Hawaii/Pacific Basin have been updated or added for representative cropping and management systems, including energy use.
- ✘ New crops, vegetations and operations have been created in RUSLE2 and WEPS to further reflect current sustainable management systems, including cover crops and specialty crops.

## DATABASE UPDATES

- ✘ A national effort was started last year to add the non ground disturbing operations to RUSLE 2 template management files.
- ✘ WEPS and RUSLE 2 databases are now better aligned, except for where model differences have not permitted full alignment.
- ✘ A new base database, database update and CMZs have been posted to the RUSLE2 website,

([http://fargo.nserl.purdue.edu/rusle2\\_dataweb/RUSLE2\\_Index.htm](http://fargo.nserl.purdue.edu/rusle2_dataweb/RUSLE2_Index.htm))

## NEW CMZ MANAGEMENT FILES

- ✘ WEPS and RUSLE2 have new CMZ management template files. They contain the energy requirements for fertilizer and pesticide applications, and all of the new crop/vegetation and operation files.
- ✘ This is the set of managements that will be stored in the Land Management Operations Database and used in the new desktop planning tool.

## ARCHIVING AND DEVELOPING NEW DATABASE

- ✘ Since significant changes were made to the base database and CMZs, you will need to archive your old database and develop your own new database, including base database, climate, soils, and management templates.
- ✘ For step-by-step instructions, see attached “Archiving an Existing MOSES Database and Building a New RUSLE2 MOSES Database for Field Office use”.

## FORAGE DATABASE FOR FUTURE RUSLE2 VERSION RELEASE

- ✘ We hope to have a stable version of the RUSLE2 graze version in the next few weeks and to have an NRCS release by Feb 2013.
- ✘ Work is continuing to develop new forage management templates which will be added to the Crop Management Zone templates with the next release.

## WINDOWS 7 ISSUES

- ✘ For those of you who have Windows 7 operating systems, it might be better to have IT load RUSLE2 in either the C:\USDA\ folder or the C:\Users\Public\ folder to allow writing to the moses.gdb database and modification of user templates.
- ✘ If RUSLE2 has already been loaded in the C:\Program files (x86)\USDA\ folder, that is fine but, you should move all supporting files to one of the above locations and point RUSLE2 to these new locations when setting the default database, selecting user templates, printing reports and selecting access levels.

## QUESTIONS AND ASSISTANCE

If you have questions or need assistance in updating your databases, call:

- ✘ your state agronomist;
- ✘ NTSC Agronomist;
- ✘ Giulio Ferruzzi, at 503-273-2429, Giulio.Ferruzzi@por.usda.gov; or
- ✘ Linda Scheffe, 402-437-5351, Linda.Scheffe@lin.usda.gov.

## KEYS TO ACHIEVING SUSTAINABLE FARMING THROUGH INTEGRATED APPROACHES



- + use integrated systems approach (ecosystem, whole farm, watershed)
- + problem-posing, problem-solving approach
- + actively seek resource, watershed, marketing opportunities
- + resource efficient and resource conserving
- + technology “exchange” vs. “transfer”
- + develop whole farm conservation; plan creatively and flexibly
- + consider on-site and off-site effects
- + focus on keeping energy flow through the integrated system
- + reemphasize biological factors, improve biodiversity
- + improving soil quality is key to improving soil, water, air, plant, animal resources
- + develop case studies, field trials, on-farm research/demonstrations, farmer-to-farmer networks
- + interdisciplinary teams including producers and partners
- + recordkeeping is tool in decision-making and management of current and future resources
- + need user friendly fact sheets, brochures on integrated systems, integrated resource assessment tools
- + NRCS should maintain and advise on its exemplary model, developing soil survey and planning infrastructure; international exchanges;