

Joint NHA HUG
Meeting
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AMP-Ohio's New Hydro Power Developments at Corps of Engineers Lock & Dam Projects on the Ohio River

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MWH

BUILDING A BETTER WORLD

AMP-Ohio Organizational Overview

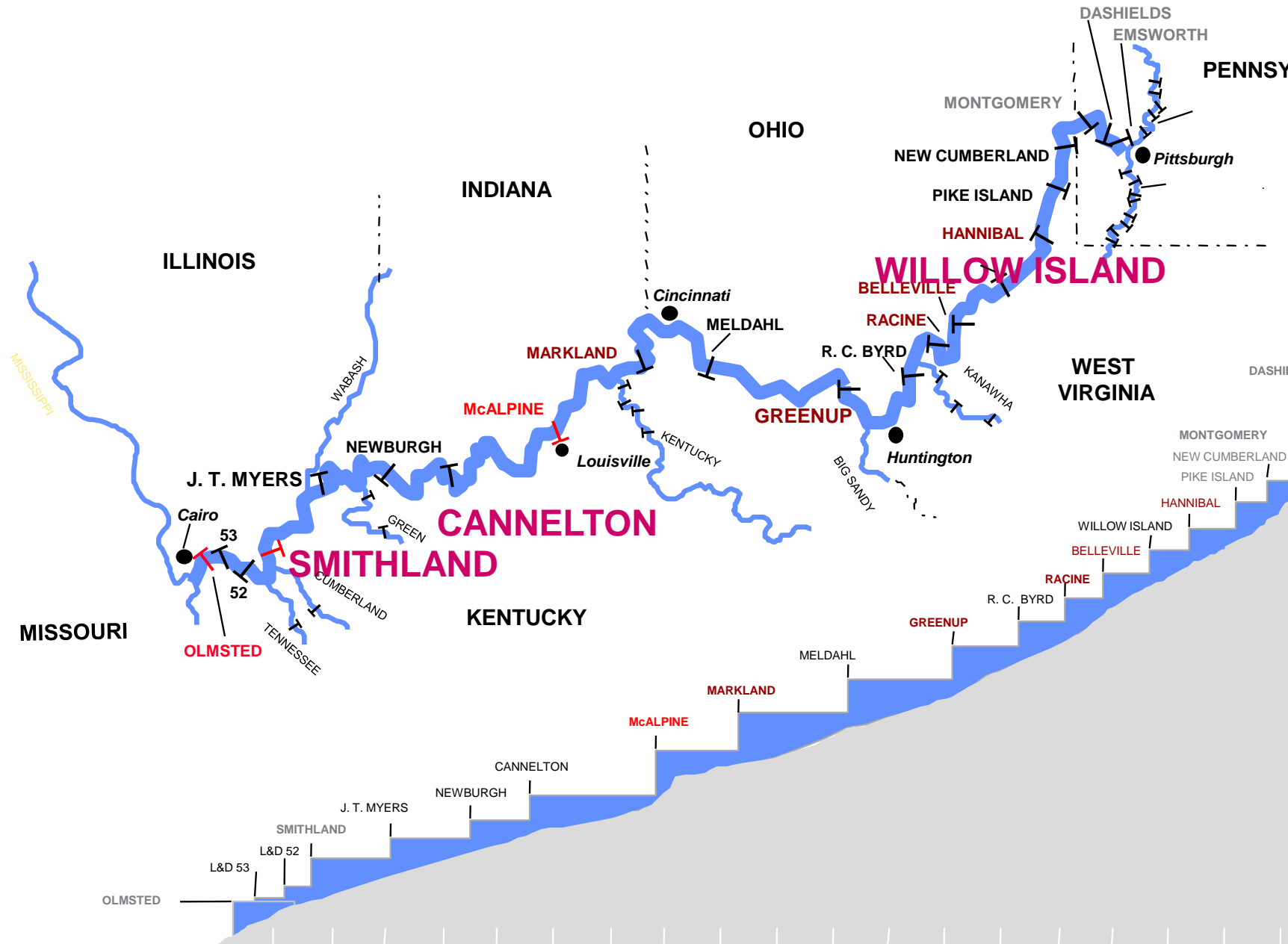


- AMP-Ohio's municipal members own and operate an electric utility distribution system and in some cases generating assets.
- AMP-Ohio has 122 Members: 81 Ohio, 27 Pennsylvania, 7 Michigan, 4 Virginia, 2 West Virginia, and 1 in Kentucky.
- AMP-Ohio operates on a cooperative basis for the mutual benefit of its Members from its headquarters in Columbus, Ohio.
- AMP-Ohio was formed in 1971 under Ohio Revised Code Chapter 1702 as a nonprofit corporation.

AMP-Ohio Hydroelectric Projects



- Phil Meier – Assistant VP – Hydro Development
- \$1.5 billion in Hydro renewable energy investment
- 4 of the 6 Hydroelectric Projects being pursued have licenses being implemented:
 - Cannelton – 84 MW in Hancock Co., KY
 - Smithland – 72 MW in Livingston Co., KY
 - Willow Island – 35 MW in Pleasants Co., WV
 - Meldahl – 105 MW in Bracken Co., KY
- Existing 42 MW Belleville Hydro Plant, Wood Co., WV



Cannelton Hydroelectric Project FERC # 10228

- Cannelton Locks & Dam – 1967
 - FERC license: 1991, 1997, 2000, 2007 (NEPA EA)
 - Water Quality Certification: Mar. 2005 & Oct. 2008
 - SHPO Clearances: 1988, 1994, 2005, 2007, 2008
 - ESA: 2005 & 2008
 - 404 Permit App: 4/11/08
 - 404 Public Notice 7/8/08
 - Section 10 Notice 12/15/08



Smithland Hydroelectric Project FERC #6641

- Smithland Locks & Dam – 1979
 - FERC license: 1988, 1999, 2000, 2007 (NEPA EA)
 - Water Quality Certification Mar. 2005 & Nov. 2008
 - SHPO Clearances: 2005 & 2008
 - ESA: 2005, 2008, 2009
 - 404 Permit App: 4/11/08
 - 404 Public Notice 7/30/08
 - Section 10 Notice 12/17/08



Willow Island Hydroelectric Project FERC # 6902

- Willow Island Locks & Dam – 1976
 - FERC license: 1989
 - NEPA Final EIS issued by FERC Sept 1988 on 19 Projects in upper Ohio River Basin
 - Water Quality Certification: 1987, 1994 & 02/24/2009
 - Cultural Resources: 1986, 1987, 2008
 - ESA: 1990, 2008 follow up surveys
 - 404 Permit App 02/01/08
 - 404 Public Notice 05/16/08



FERC Licenses and Process

- FERC licenses for up to 50 Years for non-Federal hydropower projects on navigable waters.
- Under Section 4(e) of the FPA, FERC can issue licenses for projects on Federal lands or at government dams as long as FERC finds that the license will not interfere or be inconsistent with the purpose for which the Federal reservation was created or acquired.
- FERC Standard Articles, Form L-6 preserves additional Secretary of Army Authorities
- FERC and Corps have MOU put into place in 1981
- Under MOU, Corps approve final design with regard to impact on navigation and Federal facilities
- MOU requires Licensee to work with Corps for site MOA regarding operation
- Pursuant to Section 10(e) of the FPA, Licensee pays annual charge to FERC for use of Federal Land.

Belleville Hydro Project - Construction footprint at Corps Lock and Dam Project (FERC No. 6939)



Corps Permitting & Approval Requirements

- Section 10 Rivers & Harbors Act Permit
- Section 408 Approval – Section 14 of Rivers & Harbors Act (33 USC 408)
- Section 404 Permit – Clean Water Act
- Similar to FERC, also need:
 - 401 Water Quality Certification
 - ESA clearance
 - Cultural Resources Clearance (SHPO)
 - Navigation/Floodway Protection
 - Real Estate Conveyance
 - NEPA

Corps / FERC Coordination

- Section 4e mandatory conditions in license
 - For Cannelton & Smithland License Articles include provision for:
 - Corps approve of design and construction
 - Corps approve design of contractor-designed cofferdams
 - MOA to protect operation of Federal facilities
 - Inspection Authorities for Corps
 - Requirement to conduct physical modeling directed by Corps
- 1981 MOU between FERC and Corps (ER 1110-2-1454)
- FERC NEPA document (Corps as Coop Agency or they Can Adopt it)

Physical Model Studies were carried out for Cannelton, Smithland & Willow Island - directed by Corps to ensure designs protect the Federal facilities



Key Challenges / Opportunities

- **Encouraging Corps Active Participation in Licensing (including Regulatory Branches)**
- **Encourage Corps to serve as Cooperating agency with FERC on NEPA**
- **Do Wetland Delineation and Phase I cultural investigations during licensing**
- **Determine Security Concerns early on**
- **Encourage FERC and Corps to Re-establish/update MOU**
- **Communicate, Communicate, & Coordinate with Corps and FERC**



Questions ?

Thank You

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