NFS Briefing Paper

### Groundwater Technical Guide

### Development

###  Date: November 21, 2013

**Topic:** Update on the Status of Groundwater Technical Guide Development

**Issue:** Development and revision of Technical and Field Guides for managing groundwater resources is progressing and addresses key issues regarding integration of groundwater resources in agency decision making processes. As groundwater resource management issues become more prevalent across the National Forest System, having consistent procedures incorporating best available science and technology to address current and emerging resource management issues affecting this critical resource is important.

**Key Points**: Technical Guide development includes:

1. Groundwater-dependent Ecosystem (GDE) Level I and II Inventory Field Guides were published in March 2012 (GTR-WO-86a and 86b).
2. The Groundwater Inventory, Monitoring, and Assessment (IM&A) Technical Guide is currently in development and will be published in early FY15 following reconciliation of internal FS and partner review in FY14.
3. Revision of the Technical Guide for Managing Groundwater Resources (FS-881, March 2007) will begin in FY14. The scope of the revision involves (a) technical updates on methods (b) new content needed to address new and emerging issues, and (c) removal of content addressed in the IM&A Technical Guide and GDE Inventory Field Guides.
4. Development of Groundwater Technical Notes describing detailed agency approaches for developing and gathering groundwater-related data and information to support implementation of the Field and Technical Guides and project/activity management and administration is well underway. Final versions of the first dozen Technical Notes are anticipated in late FY14.

**Background:** With the increasing pressure on NFS lands to supply the water needed for human activities in the semi-arid to arid West and elsewhere, it is becoming critical to the agency’s mission that we identify the existing groundwater resources and groundwater-dependent ecosystems on NFS lands so that they can be appropriately addressed in a comprehensive manner across the spectrum of agency decision making. In response to the Inventory, Monitoring and Assessment (IM&A) improvement strategy, the Steering Team has identified the following opportunities for improved collaboration with other agencies and conservation partners in this effort:

1. Improve interagency representatives and partner awareness of the revision effort.
2. Solicit continued participation by partner representatives on the project development team.
3. Continued partnering with The Nature Conservancy to develop, test, and document procedures for determining groundwater flows/levels needed to sustain groundwater systems.
4. Provide cooperators an opportunity for review concurrent with internal FS review.

A separate briefing paper regarding evaluation and review of the Groundwater IM&A Technical Guide follows up on these recommendations.

**Contacts**:

Rob Harper, Acting Director, Watershed, Fish, Wildlife, Air and Rare Plants, 202-205-1676

Nick Douglas, Director, Minerals and Geology Management, 703-605-4785