**OJT Training Module Cover Sheet**

**Title:** 716 How to determine plant species richness

<table>
<thead>
<tr>
<th>Type:</th>
<th>X Skill  □ Knowledge</th>
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**Performance Objective:** Trainee will be able to…
- Estimate the total number of species in an area as an indicator of biodiversity.

**Target Proficiency:**
- □ Awareness
- □ Understanding
- □ Perform with supervision
- X Apply independently
- □ Proficiency, can teach others

**Trainer Preparation:**
- Be familiar with the assigned reading material in the lesson plan that follows.

**Special Requirements:**
None

**Prerequisite Modules:**
None

**Notes:**
The method described is known as the “modified Whittaker approach.” This method counts the total number of species encountered and does not quantify each species within the plot.

**Authors:**
Johanna Pate
Chris Ebel

**Approved by:**
Shawn McVey
The Five-Step OJT Cycle for **Procedural** Training (Skill)

Cycle Step 5
Trainer/Trainee debrief

Cycle Step 4
Trainer observes
Trainee perform task and gives feedback

Cycle Step 3
Trainer coaches as Trainee performs task

Cycle Step 2
Trainer demonstrates task as Trainee observes

Cycle Step 1
Trainer/Trainee establish shared mental model

Trainer and Trainee
OJT Module Lesson
Title: 716 How to determine plant species richness

<table>
<thead>
<tr>
<th>WHAT</th>
<th>WHY, WHEN, WHERE, HOW, SAFETY, QUALITY</th>
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| Cycle Step 1 | You and trainee review the objectives of the module.  
You and trainee read and review:  
• Monitoring Manual for Grassland, Shrubland and Savannah Ecosystems, Volume II: Design, Supplementary Methods and Interpretation  
  o Plant species richness (Section II: Supplementary Methods, Chapter 10), page 57  
Note that this method is very time consuming and that a minimum estimate may be calculated from the line-point intercept data supplemented by a thorough search for exotics and other species of interest throughout a plot area.  
Note: An electronic copy of reference materials can be downloaded from numerous sites. |
| Cycle Step 2 | Follow the steps provided in the Monitoring Manual for Grassland, Shrubland and Savannah Ecosystems, Volume II for the modified Whittaker approach:  
• Materials  
• Set up of the plots  
• Recording number of species  
• Plant species richness data form  
• Plant species richness calculations |
| Cycle Step 3 | Coach trainee as trainee completes all inventory steps of the modified Whittaker approach. |
| Cycle Step 4 | Repeat Cycle Step 3 without coaching. |
| Cycle Step 5 | Provide feedback and debrief trainee. Reinforce specific items as needed until trainee is able to independently determine plant species richness. |
OJT Module Lesson Measurement of Learning

Title: 716 How to determine plant species richness

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<th>WHAT</th>
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<tbody>
<tr>
<td>Trainee’s learning is measured.</td>
<td>During project activities, assign this task to the trainee. Sign off on performance when target proficiency is achieved.</td>
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<tr>
<td>Follow-up</td>
<td>Follow-up should be done within 6 months to make sure training is retained.</td>
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</tbody>
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**Performance Report Form**

Complete attachment: Trainee Performance Report Form template.pdf

or

**SF-182**
Trainee and/or supervisor access AgLearn to verify completion of the module via its SF-182