



2007 Wind Turbine Reliability Workshop

UWIG Wind Turbine O&M User Group

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What is UWIG?

- ◆ Non-profit corporation established by 6 utilities in 1989 with support from EPRI and DOE/NREL
- ◆ Current membership is over 100 organizations, including utilities and associate members from wind development, equipment, and consulting community
- ◆ Focus on technical issues
- ◆ Mission: To accelerate the appropriate integration of wind power into the electric system

Evolution of the User Groups

- ◆ Recognition of the need for UWIG to take more proactive role in addressing the ongoing technical challenges related to wind generation for the utility industry
- ◆ Outgrowth of the favorable response to the leadership provided through UWIG funded research projects
- ◆ Response to need for analysis and dissemination of information targeted to utility audience

Wind Turbine Operations and Maintenance User Group Scope

- ◆ Exchange experiences and explore issues related to wind turbine operation and maintenance
 - O&M of wind turbine and other plant components
 - Warranty and service contracts
 - Liability
 - Plant technician training
 - Condition monitoring and predictive maintenance
- ◆ Key activity is peer-to-peer information exchange, with focus on best practices

O&M User Group Objectives

- ◆ Provide a forum for participants to exchange information on the most relevant issues to wind turbine owner-operators
- ◆ Address operating, maintenance, and management issues specific to wind turbines and other components produced by the major manufacturers
- ◆ Identify R&D and/or application studies to address specific issues that could be conducted by EPRI and NREL in collaboration with UWIG

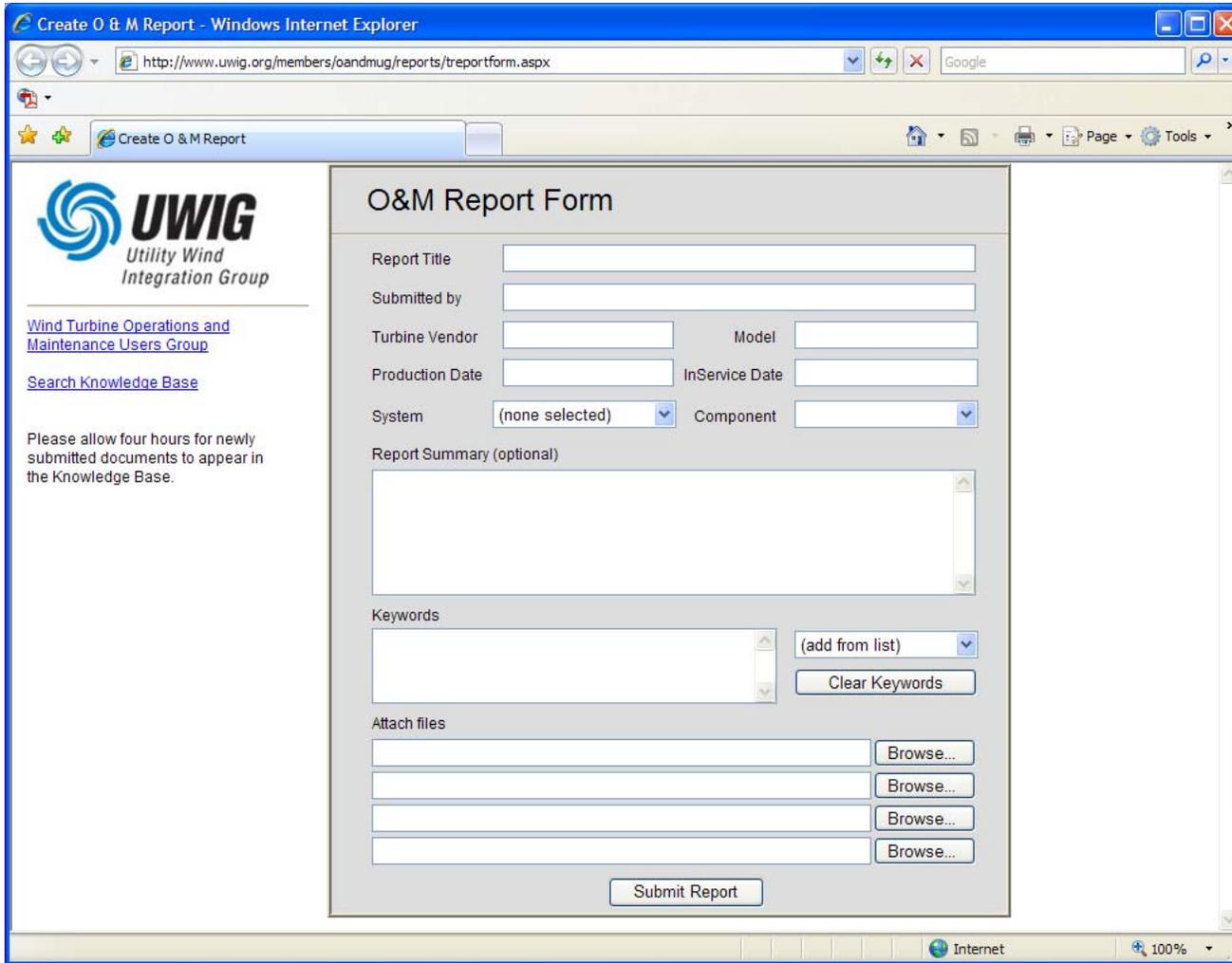
Potential User Group Topics

- ◆ O&M of turbines and other plant components
- ◆ Issues specific to a given manufacturer
- ◆ Plant technician training
- ◆ Condition monitoring & predictive maintenance
- ◆ Operational issues

User Group Tool: The Wind Plant Knowledge Database

- ◆ Google Mini selected
 - Full text search
 - 220 compatible file formats
 - One-time cost of \$2K for up to 50,000 searchable documents
 - Minimal custom web site development to create template to upload searchable documents
 - No dedicated administrator needed
 - Expandable
 - Familiar

The Wind Plant Knowledge Database



The screenshot shows a web browser window titled "Create O & M Report - Windows Internet Explorer". The address bar shows the URL "http://www.uwig.org/members/oandmug/reports/treportform.aspx". The page content includes the UWIG logo and navigation links on the left, and a central "O&M Report Form" with various input fields and a "Submit Report" button.

O&M Report Form

Report Title

Submitted by

Turbine Vendor Model

Production Date InService Date

System Component

Report Summary (optional)

Keywords

(add from list)

Clear Keywords

Attach files

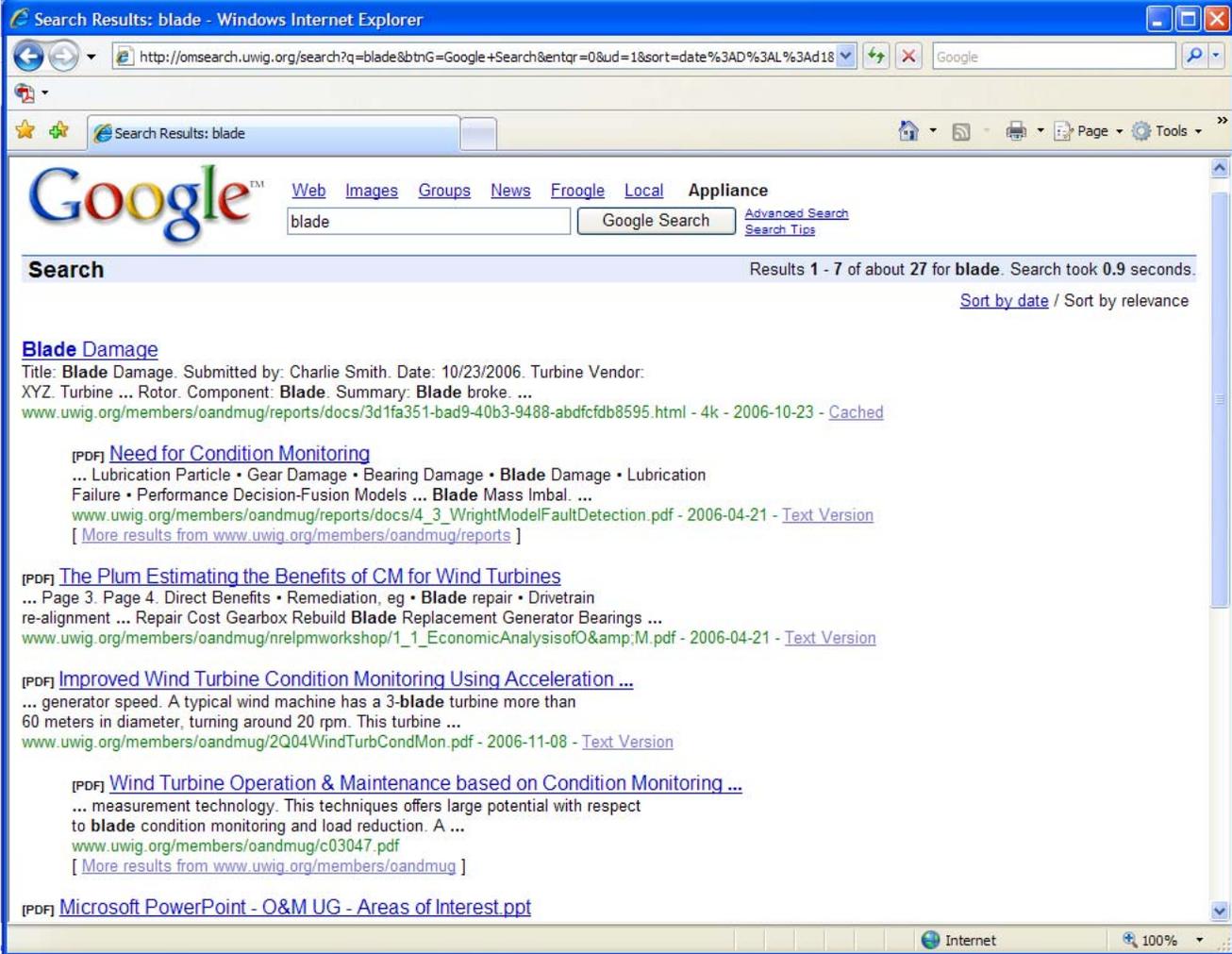
Browse...

Browse...

Browse...

Browse...

Submit Report



Search Results: blade - Windows Internet Explorer

http://omsearch.uwig.org/search?q=blade&btnG=Google+Search&entqr=0&ud=1&sort=date%3AD%3A%3Ad18

Google

Search Results: blade

Google™ Web Images Groups News Froogle Local Appliance

blade Google Search Advanced Search Search Tips

Search Results 1 - 7 of about 27 for **blade**. Search took 0.9 seconds.
[Sort by date](#) / Sort by relevance

Blade Damage
Title: **Blade** Damage. Submitted by: Charlie Smith. Date: 10/23/2006. Turbine Vendor: XYZ. Turbine ... Rotor. Component: **Blade**. Summary: **Blade** broke. ...
www.uwig.org/members/oandmug/reports/docs/3d1fa351-bad9-40b3-9488-abdfcfd8595.html - 4k - 2006-10-23 - [Cached](#)

[PDF] [Need for Condition Monitoring](#)
... Lubrication Particle • Gear Damage • Bearing Damage • **Blade** Damage • Lubrication Failure • Performance Decision-Fusion Models ... **Blade** Mass Imbal. ...
www.uwig.org/members/oandmug/reports/docs/4_3_WrightModelFaultDetection.pdf - 2006-04-21 - [Text Version](#)
[[More results from www.uwig.org/members/oandmug/reports](#)]

[PDF] [The Plum Estimating the Benefits of CM for Wind Turbines](#)
... Page 3. Page 4. Direct Benefits • Remediation, eg • **Blade** repair • Drivetrain re-alignment ... Repair Cost Gearbox Rebuild **Blade** Replacement Generator Bearings ...
www.uwig.org/members/oandmug/nrelpmworkshop/1_1_EconomicAnalysisofO&M.pdf - 2006-04-21 - [Text Version](#)

[PDF] [Improved Wind Turbine Condition Monitoring Using Acceleration ...](#)
... generator speed. A typical wind machine has a 3-**blade** turbine more than 60 meters in diameter, turning around 20 rpm. This turbine ...
www.uwig.org/members/oandmug/2Q04WindTurbCondMon.pdf - 2006-11-08 - [Text Version](#)

[PDF] [Wind Turbine Operation & Maintenance based on Condition Monitoring ...](#)
... measurement technology. This techniques offers large potential with respect to **blade** condition monitoring and load reduction. A ...
www.uwig.org/members/oandmug/c03047.pdf
[[More results from www.uwig.org/members/oandmug](#)]

[PDF] [Microsoft PowerPoint - O&M UG - Areas of Interest.ppt](#)

Internet 100%

For More Information

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