Plant Closure Study Conservation Advisory Committee

August 10, 2011

Plant Closure Study

Study period: Nov. 2010 – Apr. 2011

Evaluation Contractor: MetaResource Group

Background

- Current measure lifetime 10 years with exceptions:
  - 15 years: Irrigation and Water & Wastewater
  - 3 years: Energy Management and O&M
  - Green Houses and Nurseries
  - Lighting measures
- Thought to be conservative
- Evaluation Committee and PE program have been requesting study to update for a while

Scope

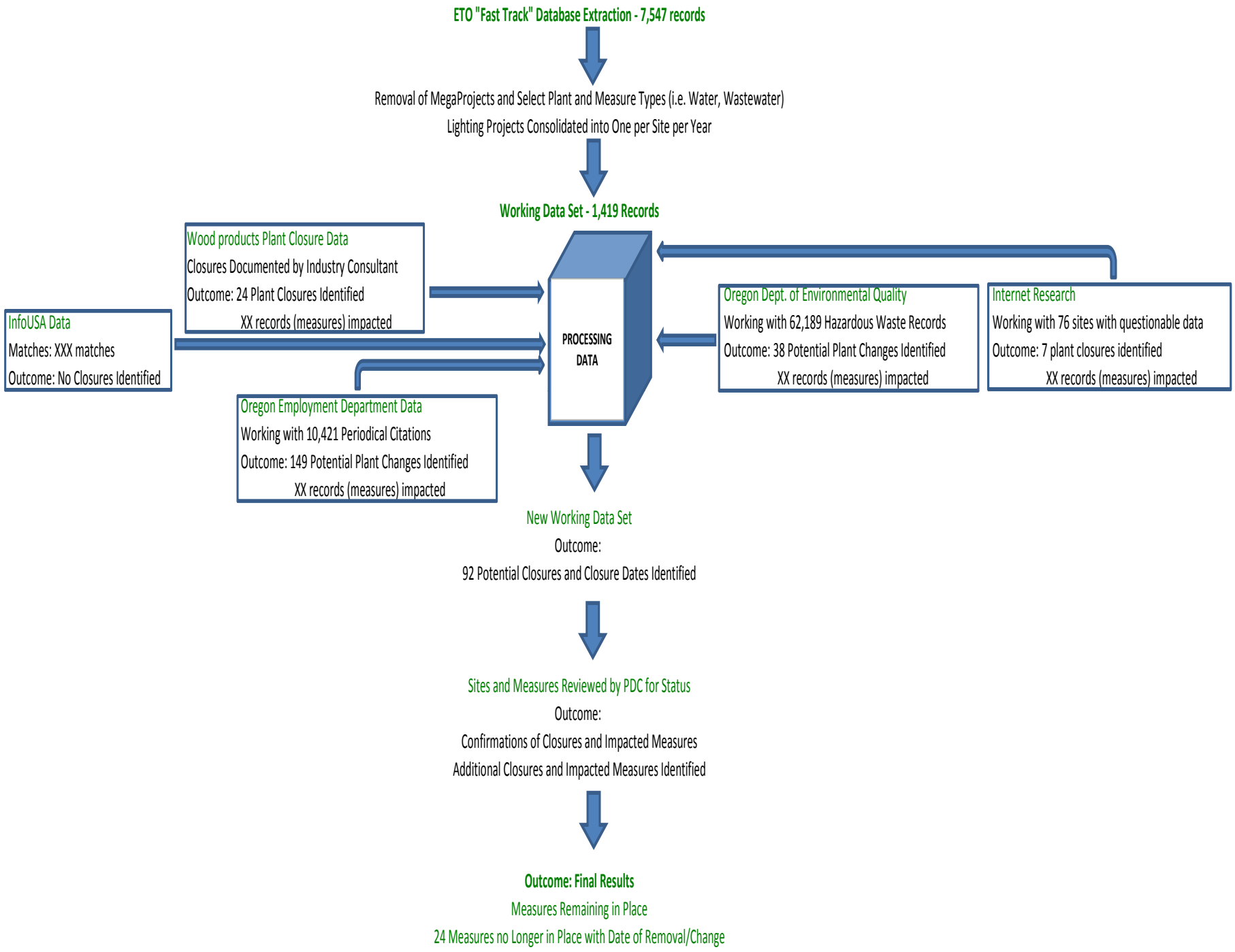
- Analysis of 2003-2009 PE measure data
- Plant closure and simple removal of measures reviewed
- Certain classes of measures not included in the analysis:
  - Mega projects
  - Electric and gas utility projects
  - EE motors
  - PE measures with alternative measure lives (i.e. O&M, SEM, and W&WW etc.)

Methods

- Lighting measures aggregated
- Triangulation of data:
  - Fastrack
  - InfoUSA (business listings)
  - Oregon Employment Department (plant closure)
  - Wood Products Plant Closures (proprietary database)
  - DEQ Hazardous Materials Sites
  - Internet search
  - PDC inquiry

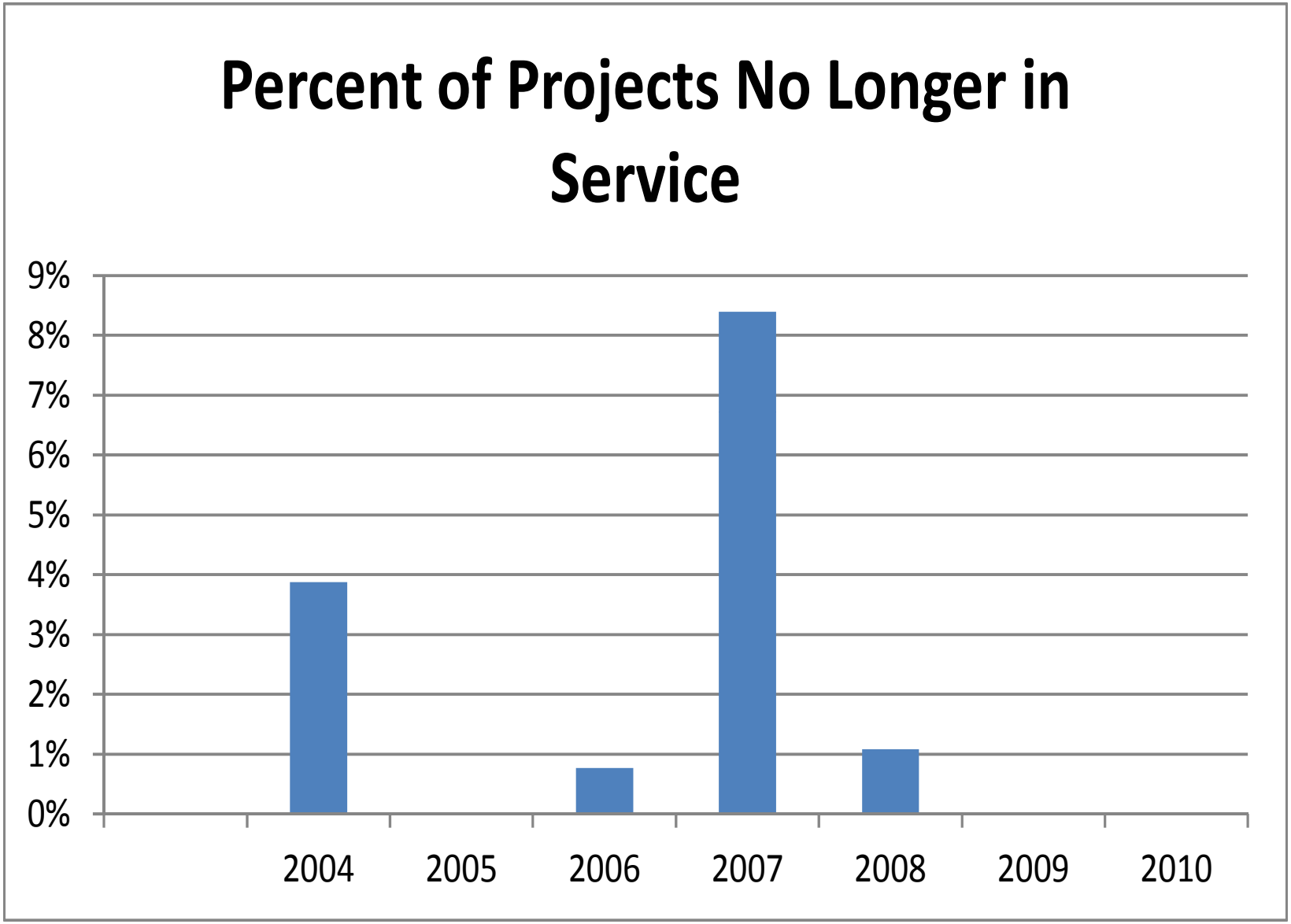
Data Issues

- Databases did not comprise a census
- Names and addresses are not normalized
- Changes in names and addresses
- Conflicting information
- Snapshot in time


ETO "Fast Track" Database Extraction - 7,547 records
Removal of MegaProjects and Select Plant and Measure Types (i.e. Water, Wastewater)
Lighting Projects Consolidated into One per Site per Year
Working Data Set - 1,419 Records
Wood products Plant Closure Data
Closures Documented by Industry Consultant
Outcome: 24 Plant Closures Identified
XX records (measures) impacted
InfoUSA Data
Matches: XXX matches
Outcome: No Closures Identified
Oregon Employment Department Data
Working with 10,421 Periodical Citations
Outcome: 149 Potential Plant Changes Identified
XX records (measures) impacted
PROCESSING DATA
Oregon Dept. of Environmental Quality
Working with 62,189 Hazardous Waste Records
Outcome: 38 Potential Plant Changes Identified
XX records (measures) impacted
Internet Research
Working with 76 sites with questionable data
Outcome: 7 plant closures identified
XX records (measures) impacted
New Working Data Set
Outcome:
92 Potential Closures and Closure Dates Identified
Sites and Measures Reviewed by PDC for Status
Outcome:
Confirmations of Closures and Impacted Measures
Additional Closures and Impacted Measures Identified
Outcome: Final Results
Measures Remaining in Place
24 Measures no Longer in Place with Date of Removal/Change

Results

- 1,419 measures analyzed
- 24 measures no longer used
- 11 sites represented by the measures
- Measures represent 1.4% of program savings and 1.7 % of measures


Percent of Projects No Longer in Service
9%
8%
7%
6%
5%
4%
3%
2%
1%
0%
2004
2005
2006
2007
2008
2009
2010

Conclusions

- 98.3% of measures still in place
- Median lifetime of defunct measures is 3.5 years
- 10 year lifetime is viewed as highly conservative

Recommendations

- Update study every 5 years
- Have PDC's gather plant closure/measure removal data

Energy Trust Take

- Lighting measures should continue using measure lifetime based on hours of use and calculated in lighting tool
- Increase other measure lifetimes to 15 years
  - 2009 Wisconsin study recommended 11 years for process and 16 years for motors
  - 2007 Massachusetts study motors 20 and lighting 15 years
  - DEER 2006-2007 motors 15 years
- Repeat study on 5 year basis
- Data does not support the precise calculation of survival rates.