Flexible Air Permitting (FAP) Results from EPA Pilot Evaluation

Source	Key Results Associated with FAP Implementation
3M St. Paul, Minnesota	• Prompted the plant to voluntarily reduce actual annual VOC emissions from 10,600 tons per year (tpy) to 4,300 tpy. Capped facility-wide VOC emissions to 4,283 tpy, and facilitated reductions in actual facility VOC emissions during the permit term to less than 1,000 tpy. • Enabled equipment renovations to improve process yields, reducing per unit VOC emissions and enabling deployment of solvent-free coating. • Provided a clearer picture of overall plant-wide emissions to MPCA in FAP reports. • Eliminated the need for about 20 case-by-case permitting actions, saving MPCA approximately $45,000 and reducing its permit backlog.
DaimlerChrysler Newark, Delaware	• Lowered actual VOC emissions from 1,165 to 776 tpy, despite increases in production. Reduced NOx emissions from 174 tpy in 1994 to 61 tpy in 2000. Enabled Chrysler to test new low-VOC clear coat paint technologies and reduce solvent usage. • Played a major role in the decision to invest $325 million to produce the Dodge Durango at the plant, securing approximately 2,900 jobs. • Increased the availability of information to DNREC and the public on plant-wide emissions, changes, and P2 activities. • Saved approximately 510 Chrysler staff hours associated with regulatory applicability assessment and permitting actions, and enabled the facility to remain on schedule for plant upgrades. Reduced DNREC time and resources needed for case-by-case review of permitting actions.
Imation Weatherford, Oklahoma	• Achieved an 11% reduction in VOC emissions generated per unit of production in 2000 when compared with 1997 baseline. • Covered emissions units previously grandfathered under the CAA; FAP encouraged Imation to install voluntary controls to enable the source to accept a 249 tpy VOC emissions limit. • Enabled Imation to rapidly move new products to market, including new low-VOC digital proofing film technology for the graphic arts industry. • Reduced ODEQ time and resources needed for administrative permitting actions, enabling ODEQ to focus scarce resources on inspections and other environmental and permitting priorities.
Intel Aloha, Oregon	• Lowered actual VOC emissions from 190 to 56 tpy despite increasing production by more than 300 percent, enabling the facility to become a synthetic minor source. Enabled dramatic reductions in solvent usage; P2 techniques at Aloha have been proliferated to other Intel facilities. • Enabled Intel to rapidly bring new generations of semiconductor chips to market without delay, saving potentially millions of dollars. • Reduced Intel staff time needed to address air permitting actions by 1,200 to 1,600 hours per year; reduced ODEQ staff time associated with processing permit actions, saving approximately 300 to 400 hours per year.
Lasco Bathware Yelm, Washington	• Reduced VOC emissions per unit of production by approximately 32%; enabled Lasco to implement in a timely manner operational changes to reduce styrene emissions and odors, addressing a key area of community concern. • Enabled production to increase from 126,045 units per year (in 1997) to 132,548 units (in 2000) while remaining below the 249 tpy VOC cap. • Saved the permitting authority and source time and resources through decreases in case-by-case permitting actions.
Saturn Spring Hill, Tennessee	• Reduced VOC emissions from 798 to 580 tpy; facilitated numerous P2 activities including three energy conservation projects, new methods to decrease HAPs, and raw material use reductions. • Selected to manufacture GM's L-850 engine, directly creating 700 new jobs, due in large part to the facility's ability to rapidly construct and modify the new engine production lines. Enabled Saturn to implement Lean manufacturing and upgrade the facility with minimal delays to produce new vehicle models, including gas-electric hybrids. • Reduced TDEC paperwork associated with processing individual construction permit applications and permit modifications, allowing agency staff to focus on higher environmental priorities.

Source: EPA, *Evaluation of Implementation Experiences with Innovative Air Permits: Results of the U.S. EPA Flexible Permit Implementation Review*. http://www.epa.gov/ttn/oarpg/t5/memoranda/iap_eier.pdf