



Economic Impact Analysis Virginia Department of Planning and Budget

9 VAC 5-40 –Regulations for the Control and Abatement of Air Pollution State Air Pollution Control Board August 25, 2005

The Department of Planning and Budget (DPB) has analyzed the economic impact of this proposed regulation in accordance with Section 2.2-4007.G of the Administrative Process Act and Executive Order Number 21 (02). Section 2.2-4007.G requires that such economic impact analyses include, but need not be limited to, the projected number of businesses or other entities to whom the regulation would apply, the identity of any localities and types of businesses or other entities particularly affected, the projected number of persons and employment positions to be affected, the projected costs to affected businesses or entities to implement or comply with the regulation, and the impact on the use and value of private property. The analysis presented below represents DPB's best estimate of these economic impacts.

Summary of the Proposed Regulation

The proposed regulations will extend the seasonal restriction on open burning activities to areas that are classified as Volatile Organic Compound (VOC) emissions control areas in 2004 and expand the restriction from June, July and August to include May and September. In addition, the regulations will amend some of the definitions in order to achieve consistency with the waste management regulations.

Estimated Economic Impact

These rules regulate open burning activities by non-residential entities in the Commonwealth. These regulations allow open burning of construction waste, debris waste, and demolition waste, but place seasonal restrictions on such activities. These regulations also provide model rules for localities wishing to adopt certain restrictions in lieu of relying on the state's regulatory program. The proposed amendments will change two important aspects of the open burning restrictions. First, the proposed rules will expand the seasonal ban on open burning

to new areas that have become VOC control areas under the new 8-hour ozone standard. Second, the seasonal restriction will be increased from three months to five months.

The new areas that have become VOC control areas under the new 8-hour ozone standard in 2004 include the counties of Gloucester, Isle of Wight, Prince George, Spotsylvania and cities of Fredericksburg, Petersburg. The total population living in these areas is estimated to be about 267,800. This represents a 6% increase in the current population covered under the seasonal restriction provisions of these rules. The proposed changes will make these additional localities subject to those provisions.

Open burning is one of the most convenient and cheapest methods for disposing non-residential debris. However, combustion emissions from land-clearing debris create health and safety risks. Of particular concern are the emissions of Volatile Organic Compounds (VOC) and nitrogen oxides (NO_x) created by open burning. Significant emissions of VOC and NO_x are observed in tests conducted to evaluate the contribution of open burning of land-clearing debris.¹ VOC and NO_x emissions, once created, contribute to Ozone pollution in the presence of sunlight. Because Ozone pollution is high in summer months, seasonal restrictions are placed on open burning activities. Thus, seasonal restriction of open burning in newly classified VOC areas under the 8-hour standard should help Virginia achieve its non-attainment targets and contribute to air quality and human health.

However, seasonal restrictions on open burning also create compliance costs that must be absorbed by land clearing and landscaping businesses. In general, open burning restrictions would not cause a business to cease operations completely, but would create some additional costs. These costs may stem from the storage of non-residential debris until it can be burned during non-restricted months, landfill costs, or rescheduling of activities that produce debris in non-restricted months. There is not sufficient data to estimate the size of the additional compliance costs that may be introduced by the proposed expansion of areas subject to open burning restrictions.

In addition, the proposed rules will expand the seasonal burning ban from June, July and August to include May and September. This change will affect all of the VOC emissions control

¹ United States Environmental Protection Agency, January 1997, "Evaluation of Emissions from the Open Burning of Land-Clearing Debris."

areas including the newly expanded areas. The nature of the costs and benefits of expanding the seasonal ban by two months will be similar. However, the sizes of the benefits and costs are probably different. For example, the air quality benefits from restricting open burning activities in cooler months are probably less than they are in hotter months because of the role of sunlight in creation of Ozone. Also, the compliance costs would increase at an increasing rate as additional months are added to the seasonal ban. In the absence of data, the net impact of decreasing benefits and increasing costs cannot be assessed at this time.

One of the unintended consequences of the proposed changes may be an increase in the illegal dumping activities in the affected localities. As compliance costs increase either because of being subject to seasonal burning ban, or because of increased length of time open burning cannot be practiced, regulated entities would look into possible cost avoiding strategies which may promote illegal dumping if enforcement is lacking.

Another unintended economic effect of the proposed changes is a decrease in the permit revenues collected by localities to allow open burning. The localities in the areas that will be subject to open burning restrictions during the summer months will likely experience a decrease in permit fees as such activities will not be allowed. There is no available estimate on the size of the fiscal impact on these localities. The localities in areas that will be subject to two additional months of open burning restrictions will also suffer from loss of permit revenues. According to the department, one affected locality reported about 61 fewer commercial burning permits will be issued causing approximately \$24,000 revenue loss for that locality.

Remaining changes are mainly clarifications of language and changing definitions to achieve consistency with the waste management regulations. These changes are not expected produce any significant economic effects other than improving the clarity of regulations.

Businesses and Entities Affected

The proposed regulations may particularly affect up to 32,507 contractors in Virginia.

Localities Particularly Affected

The new VOC control areas under the new 8-hour ozone standard include counties of Gloucester, Isle of Wight, Prince George, Spotsylvania and cities of Fredericksburg, Petersburg. Expansion of the seasonal burning ban from June, July and August to include May and

September will affect both 1-hour and 8-hour VOC control areas. Localities subject to 1-hour VOC control areas include counties of Arlington, Fairfax, Loudoun, Prince William, Stafford, Charles City, Chesterfield, Hanover, James City, York, Botetourt, Frederick, Roanoke, and cities of Alexandria, Fairfax, Falls Church, Manassas, Manassas Park, Colonial Heights, Hopewell, Richmond, Chesapeake, Hampton, Newport News, Norfolk, Poquoson, Portsmouth, Suffolk, Virginia Beach, Williamsburg, Roanoke, Salem, Winchester.

Projected Impact on Employment

To the extent the compliance costs associated with open burning restrictions in new areas discourage land clearing activities, there may be a negative impact on employment. However, affected entities are more likely to schedule their land clearing activities around the seasonal open burning ban. If so, the primary impact on employment would be seasonal: a decrease in demand for labor during seasonal ban and an increase in demand for labor during non-restricted months.

Effects on the Use and Value of Private Property

The compliance costs created by open burning ban in new areas and by the extension of ban by two months would reduce the profitability of contractor businesses involved in land clearing activities and reduce their net worth. However, whether the size of compliance costs would be significant or not is not known.

Small Businesses: Costs and Other Effects

Majority of contractors that may be affected by the proposed changes are expected to be small businesses. The proposed regulations are not expected create any significant administrative costs, but there is likely to be an increase in compliance costs. The significance of the additional costs will depend on how affected entities respond to the proposed changes. There is no available data to assess what the significance of the additional compliance costs will be.

Small Businesses: Alternative Method that Minimizes Adverse Impact

At this time, there does not appear to be a better alternative to minimize the adverse impact on small businesses to achieve the air quality standards of the Commonwealth.