



## *Airspace Design and Environmental Program*

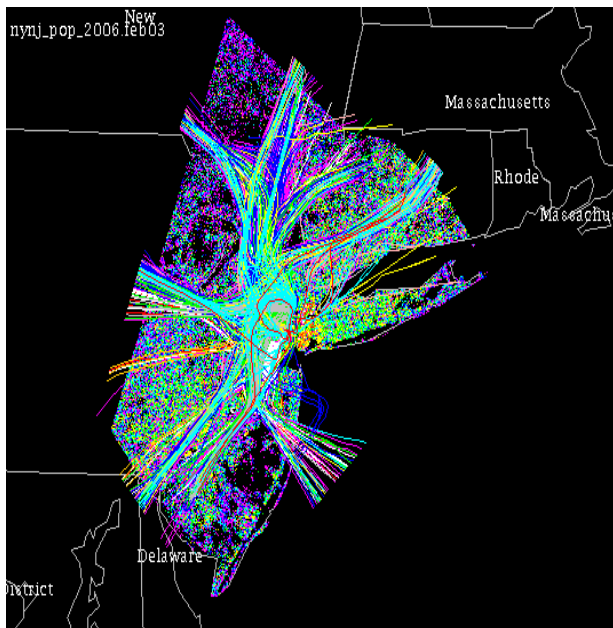
# **New York/New Jersey/Philadelphia Airspace Redesign**

### **Overview**

NY/NJ/PHL Airspace Redesign Project is a major FAA project to alleviate the strain and complexity of the current airspace while simultaneously remaining environmentally sensitive.

### **Project**

The NY/NJ/PHL Airspace Redesign Project is an analysis of current airspace use and the evaluation of possible alternatives that could enhance the use of the airspace. As a part of the redesign effort, the FAA is required to produce an Environmental Impact Statement or EIS that describes the environmental effects associated with each alternative. The alternatives range from do nothing to a complete reworking of the airspace. The study covers a five state region and includes 21 airports. Our role is to aid the airspace design team in discovering noise changes created by their designs and then to present our findings in the EIS to the public.



NIRS map displaying population density and EWR routes.

### **Technical Information**

The primary tools used to discover these changes are the Airspace Design Tool or ADT and the Noise Integrated Routing System or NIRS. ADT has two primary purposes. First it was used to identify current air traffic patterns using historical radar data. From these traffic patterns noise backbones will be created and imported into NIRS to compute noise. This analysis will be considered “baseline” in that it defines current noise levels. Then ADT will be used to manipulate the baseline backbones to model alternative designs created by the airspace design team. The alternative backbones will likewise be run through NIRS to give the airspace design team and the public some idea as to the noise impact of the changes in airspace use.