



Policy Options for Connecting Remote Communities to Air Transportation Networks

Austin Drukker, Ph.D.

Passenger aviation is a driver of the US economy, [contributing over 4% to US GDP every year](#). While most large metropolitan areas in the United States have easy access to global air transportation networks through major hub airports, residents of small, remote communities may struggle to access such opportunities. To improve access for such communities, Congress established Essential Air Service (EAS), which provides subsidies to airlines to provide service from certain remote communities to larger hubs. While the costs of EAS have been well studied, little to no research has studied the benefits of EAS.

Research conducted by [Austin Drukker](#), a National Institute for Transportation and Communities (NITC) Dissertation Fellow, sought to quantify the benefits of EAS to remote communities in order to understand whether EAS accomplished its goal of connecting these communities to the national air transportation network, or whether Congress should consider other policies to meet this objective.

THE RESEARCH

The researcher posed three main questions:

1. How much do remote communities value Essential Air Service?
2. How does the value of Essential Air Service compare with its costs?
3. Are there alternative policies Congress should consider to connect remote communities to the national air transportation network?

To answer these questions, the researcher collected data containing information about the home ZIP code of airline ticket purchasers coupled with their choice of airport. The data allowed the researcher to determine how far travelers drove to the airport and by how much they valued their time, using information about the price paid for the ticket. The researcher compared how many travelers from remote communities drove to their local, EAS-subsidized airport compared

to how many drove to a larger, faraway airport, and used this information to compute the monetary value that community members placed on having access to an EAS airport.

The analysis revealed that residents of the communities receiving EAS generally did not place a high value on having access to commercial service from their local airport. Instead, the data revealed that a substantial share of travelers in remote communities with access to an EAS-subsidized airport chose to drive – in some cases, several hours – to a larger hub airport. Using data from 2019, the researcher found that the total value that communities derived from the EAS program was \$16 million, compared to a cost of \$290 million.

The research suggests that Essential Air Service is not in fact essential: alternative modes – namely, personal automobiles and coach buses – are viable alternatives for connecting remote communities to the national air transportation network. Previous research has found that approximately 80% of the US population lives within 70 miles (about a 1.5-hour drive) of a small, medium, or large hub airport, and that 98% of the US population lives within 180 miles (about a 3-hour drive) of a small, medium, or large hub airport.

FINDINGS & IMPLICATIONS

Stakeholders often claim that EAS provides an essential service to community members who would otherwise lose access to the national air transportation network. But this research shows that alternative modes are frequently employed used by members of these communities in order to access commercial air travel.

The researcher identified three main reasons why EAS is underutilized:

1. EAS may provide poor, unreliable service: Most communities receiving EAS-subsidized service are only served by one carrier with two flights per day to one or two larger hubs. In some cases, the contracted carrier is

an established “legacy” airline (American, Delta, United), which can generally be relied upon to provide consistent, seamless service. In other cases, EAS is provided by non-legacy carriers that may provide poor, unreliable service. Community members appear to prefer to drive to a larger hub to avoid the hassle of dealing with an additional stop and potentially multiple carriers.

2. For most communities receiving EAS, alternative airports are not that far away: Communities can be eligible for EAS if they are more than 70 miles from a medium or large hub airport. At an average speed of 50 miles per hour, it would only take about 1.5 hours to drive 70 miles, which is not unreasonably far. For example, Macon, Georgia, receives EAS but is only 1.5 hours from Hartsfield–Jackson Atlanta International Airport – the busiest airport in the world. According to the data analyzed by the researcher, only 3% of air travelers from Macon choose to fly from their local, EAS-subsidized airport, while 94% of air travelers from Macon choose to drive to and fly from Atlanta.
3. People who choose to live in remote communities choose to live far from a major airport: Easy access to commercial aviation may not be that important for residents of remote communities. Convenient commercial air service may not be utilized if it is not desired by the community.

Given the research findings, the researcher identified three key weaknesses in current EAS policy that Congress might consider:

1. Proximity to small hubs is irrelevant for EAS eligibility: Communities can be eligible for EAS if they are more than 70 miles from a medium or large hub airport. Medium and large hubs account for about 15% of all commercial airports in the United States. But many commercially viable airports are classified as small hubs. For example, Gerald R. Ford International Airport in Grand Rapids, Michigan, is a small hub served by 6 major airlines offering more than 100 daily flights to over 30 destinations. Muskegon, Michigan – with a population of about 40,000 – is about 50 miles from Ford International Airport and receives EAS. Holland, Michigan – with a similar population to Muskegon – is about as far from Grand Rapids yet does not receive EAS. The researcher recommends that EAS eligibility be tightened by considering a community’s distance to small hub airports.
2. 70 miles to the nearest hub is arguably too short: As noted above, driving 70 miles to a commercial airport is not unreasonably far. In normal traffic conditions, driving

70 miles could take anywhere from 1 to 2 hours. Several communities receiving EAS are located about 1.5 hours from very large commercial airports, including: Macon, Georgia (to Hartsfield–Jackson Atlanta International Airport); Eau Claire, Wisconsin (to Minneapolis–Saint Paul International Airport); and Prescott, Arizona (to Phoenix Sky Harbor). The researcher recommends that EAS eligibility be tightened by eliminating eligibility for communities less than 100 miles from a small, medium, or large hub.

3. Multi-modal solutions are discouraged: EAS requires that carriers connect communities to a larger hub using an airplane. If carriers propose using alternative modes – such as inter-city coach bus – to connect communities to a larger hub, then they would be ineligible from receiving federal subsidies. This requirement to use airplanes to connect communities encourages wasteful spending and increases greenhouse gas emissions. The researcher recommends that Congress embrace multi-modal solutions to connect remote communities to the national air transportation network.

Although increasing access for rural communities to the national air transportation system is a worthy policy goal, “How Essential Is Essential Air Service? The Value of Airport Access for Remote Communities” suggests there is much room for improvement. Embracing multi-model options has the potential to reduce wasteful spending while improving the connectedness of remote communities to the global economy via commercial air travel.

ABOUT THE AUTHOR


The research was conducted by Austin Drukker, who received his PhD from the University of Arizona.

ABOUT THE FUNDERS

This research was funded by the National Institute for Transportation and Communities, with additional support from the University of Arizona.

THE REPORT and RESOURCES

For more details about the study, download the full report “How Essential Is Essential Air Service? The Value of Airport Access for Remote Communities” at nitc.trec.pdx.edu/research/project/1550

 The National Institute for Transportation and Communities (NITC) is one of seven U.S. Department of Transportation national university transportation centers. NITC is a program of the Transportation Research and Education Center (TREC) at Portland State University. This PSU-led research partnership also includes the Oregon Institute of Technology, University of Arizona, University of Oregon, University of Texas at Arlington and University of Utah.

