Block Grant Transportation Financing: The Interstate Trade-in Experience

ARNOLD J. BLOCH and WILLIAM H. CROWELL

ABSTRACT

In 1974 Congress began the Interstate Highway Trade-in program, which allows urban areas the option not to build an Interstate segment, but instead to use an amount equal to the segment's cost for transit projects. Since then the program has been expanded to allow highway substitute projects as well. The program has infused a massive amount of funds into a relatively small number of urban areas. The program resembles a block grant in many ways. Urban areas are awarded a set amount of funds and state and local governments determine how to spend the funds and to what modes they should be directed. The experience of the program demonstrates the diversity of local decision making, but also shows how important national concerns (in this case, infrastructure repairs) can be addressed without strict categorical grant programs. Finally, trade-in also demonstrates one difficulty block grants generally experience: reluctance of the federal government to relinquish control.

Since 1944 Congress has enacted legislation to encourage the construction of an Interstate highway system. From its original authorization that year, to the landmark 1956 legislation, through later acts that added nearly 2,000 route miles to the originally planned system, nearly $200 billion (expressed in 1979 dollars) in combined federal and state funds have been spent on nearly 43,000 miles of Interstate construction, which represents two-thirds of total federal highway funding. At the same time, however, anti-highway sentiments were growing within a number of the nation's urban areas, often focusing on proposed urban Interstate links. Increasingly, city and state officials were faced with a difficult, no-win decision: either proceed with highway plans in the face of mounting community and political opposition or not build the highway and lose a substantial infusion of federal funds into the area (at a highly favorable 90:10 matching share arrangement). Eventually Congress responded to this dilemma in 1968 by passing the first legislation that began to alter the rate of Interstate construction.

INTERSTATE CONSTRUCTION TO INTERSTATE TRADE-IN: CATEGORICAL TO BLOCK FINANCING

The 1968 Howard-Cramer Amendment allowed Interstate-for-Interstate transfers, giving states the right not to build a particular Interstate highway while permitting an equivalent-cost Interstate to be built elsewhere. But by the early 1970s it was clear that Howard-Cramer was not an adequate solution. In areas such as Boston, Philadelphia, and Washington, D.C., where strong anti-highway and pro-transit sentiment existed, highway-for-highway transfers were an unsatisfactory option.

Out of this dissatisfaction came the trade-in amendment included in the Federal-Aid Highway Act of 1973. This amendment allowed urbanized areas, on joint request of the local government and the governor and approval by the U.S. Department of Transportation (DOT), to withdraw an Interstate segment and use the equivalent funds to finance the same types of transit capital projects that qualify under Section 3 of the Urban Mass Transportation Act (e.g., construction of facilities and vehicle purchases). The amount of funds authorized for these substitute projects was to be equal to the approved estimated cost of building that highway segment. Substitute projects were to be funded from general revenues, not the Highway Trust Fund, at an 80:20 matching ratio, equivalent to the UMTA Section 3 matching ratio.

Since 1973 the trade-in provision has been amended five times; the latest amendment was December 1982. The history of the trade-in evolution has generally been one of expansion: more segment types eligible for withdrawal, increased valuation of the withdrawn segment, expanded choice of the use of trade-in funds, tapping of the Highway Trust Fund, increased federal matching share for substitute projects, and extension of the date during which withdrawals and substitute projects can be implemented. From 1976 to the present, trade-ins can be enacted for proposed Interstate segments both within urbanized areas and for connecting separate urbanized areas within a state. The authorized value of the withdrawn segment was the most recent, congressionally approved construction cost estimate plus the effects of inflation on the highway construction industry. In addition, the unobligated balance of an authorized trade-in continued to be adjusted quarterly for the same inflationary impacts. (These inflation adjustments have ended in 1984; however, to compensate recipients, all unobligated balances will be boosted by about 20 percent.) Obligations are made for a wider range of projects, including not only the types of transit capital projects that are eligible under UMTA Section 3 but also highway capital projects normally funded from one of many federal-aid highway funding systems (i.e., Interstate, primary, secondary, and urban). Funds for highway projects come from the Highway Trust Fund; funds for transit projects come from general revenues. The trade in funds pay 85 percent of any substitute project, with only 15 percent required from state or local sources. This compares favorably with UMTA Section 3 projects (80 percent) and federal-aid to primary, secondary, and urban systems projects (75 percent).

Utilization of the Trade-in Mechanism

Interstate highway segment withdrawals were allowed through September 30, 1983 (except for those segments under court injunction, which still can be withdrawn through fiscal year 1985). During the

previous 10 years, nearly 30 urban areas have traded in a total of 56 Interstate highway segments in 48 separate trade-in actions. Nearly 340 miles of Interstate segments were involved in these actions; the longest is a 41.1 mile highway between Providence, Rhode Island, and Fall River, Massachusetts. Pittsburgh and the Washington, D.C. area share in withdrawing the shortest links, 0.4-mile segments, from their respective central business districts (CBDs).

A number of urban areas have enacted multiple trade-ins, including separate links of the same highway or beltway system, and unrelated Interstate links. The Washington, D.C. area (including adjacent Virginia and Maryland) has been the most prolific user of the trade-in program. Between 1975 and 1983 it withdrew 13 segments totaling 18.7 miles, in 9 separate actions.

Significant opposition to highway construction led to eventual trade-in in a number of urban areas. In Boston it was the strong anti-highway movement that actually contributed to the creation of the trade-in option. But as early as the first Washington, D.C. withdrawal in 1975, some urban areas envisioned trade-in as a means of supporting new transportation priorities over earlier established expressway objectives. Such new priorities included creation of rail transit service (Portland, Oregon; Sacramento; San Francisco; and Washington, D.C.), upgrading of existing transit services (New York City and Philadelphia), and rehabilitation or reconstruction of existing bridge and highway facilities (Albany, Portland, and Tucson). Other areas still considered expressway objectives as most important and enacted trade-ins as a means of completing expressway projects that were either more important or less controversial than the withdrawn Interstate facility (Baltimore, Hartford, Philadelphia, and Pittsburgh). Finally, a few urban areas still supported the need for a highway facility within the Interstate corridor, but enacted a trade-in as a means of constructing a scaled-down facility in place of the withdrawn segment and also as a means of having funds available for other highway or transit projects (Denver; Omaha; Salem, Oregon; and Waterloo, Iowa).

At the time that all trade-ins were enacted, their total value exceeded $10 billion. As of the end of 1983, $6.4 billion had been obligated to nearly all the urban areas involved. Because unobligated balances have accrued in value, some $7 billion was left to be obligated at the beginning of 1984.

Transit substitute projects received $4.6 billion, or 72 percent of all obligations through 1983. Most has gone to only two areas: Washington, D.C., which has used its $2.2 billion almost exclusively to build and equip its new subway system, and Boston, which has spent more than $1.4 billion on its existing rapid transit system.

Highway substitute projects have received slightly less than $1.8 billion or 28 percent of all obligations. Chicago has received 44 percent of this amount and Portland more than 9 percent.

The broad spectrum of substitute projects that have been funded so far are briefly described in the following paragraphs.

Transit

1. New rail facilities. The major projects include construction of the Metro heavy rail system in Washington, D.C. and the extension and relocation of heavy rail lines in Boston. In addition, Baltimore is funding construction of its new heavy rail system. Finally, both Portland and Sacramento will build new light rail lines using substitute funds.

2. New rail equipment. Philadelphia has purchased new vehicles for heavy and light rail systems. As part of their major construction projects, both Washington, D.C. and Boston have also purchased new vehicles.

3. Rail reconstruction and rehabilitation. New York City, Philadelphia, and the New Jersey portion of the New York City area have funded extensive track and station rehabilitation projects in their subway and commuter rail systems. Hartford is renovating a CBD intercity rail station. San Francisco will rehabilitate a commuter rail line.

4. Bus purchases. Albany, Hartford, Philadelphia, and Tucson have all purchased new buses for existing transit systems.

5. Other. Denver has built a CBD transit mall. Albany, Chicago, and Philadelphia have built, reconstructed, or rehabilitated transit vehicle storage and repair facilities. Denver has instituted a ride- sharing program.

Highway

1. Replacement facility. Omaha and Denver are constructing expressway facilities situated in the same corridor as the withdrawn Interstate. Salem, Oregon, will do the same for an arterial to replace the withdrawn Interstate.

2. Other new expressway or arterial construction. Omaha, Philadelphia, Pittsburgh, and San Francisco are constructing expressway and arterial facilities elsewhere in the urban area. Tucson has added lanes to an existing Interstate facility.

3. Reconstruction or widening of collectors and local streets. A number of urban areas, including Chicago, Denver, Hartford, Portland, and Salem, have funded these types of substitute projects.

4. Rehabilitation or reconstruction of bridges. Many urban areas have also funded these types of projects, primarily focussing on small-scale but crucial central city bridges. These urban areas include Chicago, Cleveland, New York City, the New Jersey portion of New York City, Portland, and Salem.

Most urban areas have formally or informally stated that they would like to spend a majority of their remaining trade-in funds on highway projects. Seventeen urban areas estimate that they will spend between 51 and 100 percent of available funding on highway projects. Only six areas would choose to spend a majority on transit projects. Of the remaining funds, approximately 60 percent would be used for highway projects under current planning.

The Implications of Trade-in

The trade-in option converts funds that are provided to build a particular highway segment into funds that can be used for a diversity of transit and highway purposes, anywhere in an urbanized area, according to a programming schedule established by the funding recipients. In other words, funds previously available under a categorical grant program (i.e., federal-aid Interstate), where the end use is strictly controlled by a previously approved design proposal and by Interstate highway standards and procedures, are now available under a format that resembles a block grant (i.e., the trade-in program). Although never openly declared a block grant, the main objective of establishing and later expanding the trade-in program has always been to give

state and local governments greater control over the use of a particular funding source while reducing federal control, which is essentially the meaning of a block grant.

Because significant interest currently exists in the block grant format as a federal funding mechanism, it is useful to examine the performance of the trade-in program within this context. Three issues are addressed here: (a) the effect on the federal-state-local government relationship, (b) the diversity of substitute projects, and (c) the limitations of block grant concepts.

Government Relationship

Under the normal categorical grant structure of federal transportation funding, the federal government has a clearly defined relationship with state and local government. Essentially, FHWA deals with the state on federal-aid highway programs and with the urban area on UMTA Section 3 grants. The regional metropolitan planning organization (MPO) becomes involved through the various mandates of federal urban transportation planning guidelines.

The channels are less defined in the trade-in program, however. Trade-in requests must be approved by the governor and local officials, but may be initiated by any of the parties. Requests to the federal government for substitute project funding must be submitted by the governor, but may be developed by any of the parties (although project development and programming is subject to the same urban transportation planning guidelines as other highway and transit projects). The result has been that among the urban areas that have enacted trade-ins, the levels of government that assume lead planning and implementation roles vary greatly.

States have played the primary roles in Boston, Denver, Hartford, Omaha, and New Jersey trade-ins. Local governments have played a more important role in Duluth, Memphis, New York City, Pittsburgh, Portland, Salem, and Tucson. In Albany, Cleveland, Minneapolis, and Washington, D.C., the MPO was the most prominent level of government. In seven other areas, the trade-in request or substitute project development responsibilities were shared in some manner by local, state, and regional bodies.

The particular level of government that assumes the lead position in the trade-in process is a function of various factors, among them the importance of an Interstate link to a state or regional highway plan, the relative prominence of state and local departments of transportation in urban transportation planning and financing, the general powers invested in the MPO, and the relative political clout wielded by the governor, mayor, city or county legislatures, state departments of transportation, and so forth. The relative importance of these factors is highly specific to the given urban area. The absence of a federal structure assigning lead and secondary responsibilities have contributed to delays in both the withdrawal request and substitute project development processes (e.g., Chicago, Hartford, Memphis). It almost certainly has resulted in a considerable amount of negotiation and compromise among the various parties involved (e.g., Cleveland, Minneapolis, Portland). But this is not necessarily bad, and it may have resulted in a more representative local consensus on transportation needs and remedies than typically is achieved through the formal structure of other FHWA and UMTA funding programs.

Another aspect of the state-local government relationship involves matching share. Under the Interstate program, the federal government provides 90 percent of the costs, and the local matching share is 10 percent. Over the years, this 10 percent matching share has almost always been provided by the state government. A system of state highway revenue generation and disbursement to urban areas to cover expenses under the Interstate program (and other federal-aid programs) has been in place for some time, with changes having occurred incrementally, primarily after FHWA created or deleted new categorical grant programs or program criteria.

The trade-in program created a radically new situation. With the 85 percent/15 percent setup, a previously authorized sum of money suddenly necessitated 5 percent more matching share (and before 1978, 10 percent more for transit projects and 20 percent more for highway projects). Corridor-directed funding suddenly became urban area-directed funding, potentially affecting overall disbursement formulae. Finally, transit projects were now eligible to be funded, a drastic change from the point of view of the states, because some states were restricted by law or longstanding policy from providing matching shares for transit projects.

Despite these inherent difficulties, providing the matching shares for trade-in substitute projects has not been a significant problem. In some cases, the state is still providing the complete matching share, whether for highway or for transit purposes (e.g., Chicago, Indianapolis, New Jersey). Various arrangements have been worked out in other areas, for example:

- Baltimore: State pays all transit share and highway share outside city limits; city of Baltimore picks up the share on its own municipal highway substitute projects;
- Duluth: Localities will assume the share, but will also receive some remunerative support from the state;
- Memphis: Fifty percent of transit funded by state and 50 percent by city; and
- Portland: State will pay transit share in return for Portland giving up federal aid urban systems (FAUS) funding.

The MPOs in some areas have helped bring about firm matching-share commitments from relevant municipalities and counties (e.g., Albany, Cleveland, and Minneapolis). It can be concluded that if the federal source of funds is viewed as particularly beneficial (i.e., substantial sum, high federal share, and continual), then matching-share arrangements for block grants are not difficult to achieve (despite a co-existing, highly formalized system of matching-share arrangements for other FHWA and UMTA programs).

Substitute Project Diversity

Trade-in funds have been (a) used for various purposes, (b) used to fund various size projects, (c) distributed either within the original highway corridor or throughout the urban area or both, and (d) either combined with other federal or state and local funding sources or segregated from them. This diversity reflects considerable variation in the planning preferences and transportation needs of urban areas.

During discussions with state and local transportation officials in the urban areas that have enacted trade-ins, a common fear expressed was that detrimental effects would occur from a wholesale conversion of the federal funding structure into one or a few block grants. Among the prominent concerns was that large and publicly visible construction projects would consume such a large portion of the

funds available to an urban area that vital but less visible reconstruction and rehabilitation projects would always be underfunded. Many of these officials were relieved that a highly structured categorical grant program existed to fund important smaller projects through such programs as FAUS, bridge rehabilitation and reconstruction, and so forth.

Results of the trade-in program indicate, however, that open-ended funding sources are used for a variety of purposes. As the program developed, urban areas even showed a greater proclivity to fund a variety of smaller bridge, highway, and transit reconstruction and rehabilitation projects rather than the major construction efforts undertaken by Boston and Washington, D.C. Obviously this reflects, in large part, a growing tendency among urban areas to repair existing infrastructure to meet current needs rather than to expand infrastructure and services to satisfy new or latent travel demand. What is also apparent is the relative ease in which a block grant-type funding source can be used even as local transportation priorities shift dramatically.

Indeed, the 9-year experience of the trade-in program is a clear indication of the growing desire for a change in overall federal transportation funding policies. Trade-in actions demonstrate the types of otherwise underfunded projects that various states and local areas want in exchange for another project with solid fiscal backing--that is, an Interstate highway previously identified as important. Highway projects, and in particular so-called 4R projects (resurfacing, restoring, rehabilitating, and reconstructing) have emerged as the main substitute project choices among trade-in actions in urban areas. This trend has been carried over into the mainstream of federal transportation financing. The 1982 Surface Transportation Assistance Act (STAA) infuses a significant amount of new funding into highway programs in general, and 4R-type funding in particular. The trade-in block grant type program clearly served as a barometer to this development.

Limitations of the Block Grant Concept

The formal structure of the trade-in program makes it appear similar to the structure of a block grant. However, before 1983, the informal process of federal funding restricted the full block grant potential of trade-in. Although withdrawal approval means formal authorization of funds to an urban area for substitute projects, obligations can only be made if Congress has appropriated sufficient funds for a given fiscal year. Congressional appropriations for the trade-in program increased from $61 million in fiscal year 1974 to $954 million in fiscal year 1980 to the fiscal year 1982 level of $828 million. Despite the increase in appropriation amounts to approximately $800 to $900 million, the U.S. Department of Transportation could have obligated more than $1 billion for substitute projects if given the budgetary approval. A survey conducted by the Chicago Area Transportation Study in March 1981 revealed that among only 16 of the currently qualifying 25 urban areas, substitute projects proposed for fiscal year 1982 amounted to between $1.1 billion and $1.2 billion.

The constraints imposed by low trade-in appropriation levels caused some urban areas to postpone (or identify alternative funding sources) some substitute projects, either because they required large up-front funding that may not have been available, or because they required a steady flow of funds over several years that could not be guaranteed. In recent years, Congress not only specified a level of appropriations but also how much was to be spent on transit versus highway, and how much was to be distributed to each of the various urban areas. The apportionments resulted in many changes in the choice and scheduling of substitute projects.

The results of these appropriation constraints were that (a) urban areas lost flexibility in the types of projects they could choose (i.e., especially the mode and size of the project), (b) federal control over funding program direction was once more restored (although control shifted from DOT to Congress), and (c) as funding constraints continued, trade-in became a less reliable federal source of funding and was therefore taken less seriously by urban areas. The net effect was a diminution or actual loss of the block grant characteristics created by the trade-in program.

Beginning in 1983, however, much of this restrictiveness on the block grant nature of the trade-in program was removed by the 1982 STAA. The 1982 STAA substantially increased highway substitute project appropriations--from approximately $300 million (fiscal years 1980-1982) to more than $700 million (fiscal years 1983-1986). Although transit appropriations were reduced from approximately $500 to $600 million (fiscal years 1980-1982) to $300 to $400 million (fiscal years 1983-1986), this reflected in large part the lessened demand for such funds. However, the particular action most responsible for the easing of federal control and restrictions is the adoption of a standardized means of apportioning the majority of annual trade-in appropriations. Seventy-five percent of annual appropriations for trade-in highway projects and one-half of all transit trade-in funds are to be apportioned to urban areas on the basis of a congressionally approved cost estimate of completing substitute projects (similar to the way in which Interstate construction funds are apportioned). Remaining funds are to be distributed at the discretion of the Secretary of the U.S. Department of Transportation. All these changes should significantly improve both the reliability of the trade-in program as a funding source and its flexibility as a block grant-type mechanism.

CONCLUSIONS

The impact of the Interstate highway trade-in program has been significant. First, it has injected a massive amount of federal funds into a relatively few urban areas for various transit and highway needs. Some $6.4 billion in federal funds have been obligated to nearly 30 urban areas from July 1974 through 1983. By the time all authorizations are fulfilled, more than twice that amount will be obligated. These funds have been and will continue to be an important supplement to other federal, state, and local transportation funding sources.

Second, the trade-in program has greatly expanded the principle of making traditional highway-oriented programs available for transit purposes. The FAUS program was the first highway program opened for transit uses, but only about 5 percent of total FAUS funds obligated have been used for transit projects. The trade-in experience has been dramatically different. Nearly 72 percent of obligations made through 1983 have been for transit purposes. And some 40 percent of future obligations are expected to be for transit purposes. The effects have been varied and important--from construction of a major portion of the Washington, D.C. Metro subway system to a CBD transit mall in Denver. It can be asserted that the use of trade-in funds for transit purposes paved the way for the tapping of the Highway Trust Fund for large-scale UMTA funding in 1983.

Third, and most important, the trade-in program has demonstrated in a major way that a categorical funding program can be made more flexible and yet remain an effective and responsible source of federal financing. Funds have been used for the complete range of eligible projects--from rail transit and freeway construction, to bus fleet and bridge replacement, to transit station and local street rehabilitation. Often there have been delays in generating a list of proposed substitute projects, especially because a diverse set of governments and interests must reach a consensus without the benefit of rigid guidelines for using particular funds as prescribed by the federal government. But, on the other hand, there has rarely been any difficulty in generating matching shares for Interstate trade-in projects, which indicates the value of the program as viewed by its users. Overall, the trade-in experience demonstrates the potential success of future block grant mechanisms for federal urban transportation financing.

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Financing Local Roads in Indiana: A Status Report

JON D. FRICKER

ABSTRACT

Indiana, like almost every other state, is slipping farther behind in the struggle to repair and maintain its deteriorating roads and streets. Just as the way in which this difficult situation developed in Indiana may differ from the details of other states' experiences, so might Indiana's efforts to cope with the problem. Many states raised motor fuels taxes in 1983 to supplement the funds made available by the 1982 Surface Transportation Assistance Act. However, only a portion of these road funds will be available at the county and city levels. Described in this paper are several programs recently introduced in Indiana that are specifically directed to road and street maintenance and repair at the local level. By reviewing these programs, seeing the degree to which they have been implemented, and examining the reasons for their less-than-universal use in Indiana, other states may be able to learn valuable lessons for devising their own techniques for generating revenue.

In 1959 the federal gasoline tax was set at 4 cents per gallon. During the next 23 years, the costs of building and maintaining roads increased considerably. Only the steady increase of automobile travel during the 1960s and early 1970s kept the Highway Trust Fund revenues on the rise as well. By the late 1970s automobile travel began to level off, and even decrease, which therefore caused a decrease in gallons of gasoline sold. After years of discussion and some false starts, the 1982 Surface Transportation Assistance Act (STAA) became law in January 1983. It replaced the 1978 STAA legislation by increasing the federal motor fuel tax to 9 cents per gallon, 1 cent of which was to be set aside for mass transit programs.

Since 1956 Indiana had been a donor state with regard to the Highway Trust Fund. Having completed most of its Interstate segments in the early years of that construction program, Indiana suffered the two-edged sword of the Highway Trust Fund allocation formula: (a) few uncompleted Interstate sections to attract federal funds and (b) an Interstate system of advancing age to maintain with the use of state funds. In recent years Indiana has ranked near the bottom in percentage of federal fuel tax revenues returned as federal highway assistance. In response to this problem, Indiana became one of the first states to structure its state motor fuels tax (MFT) on an ad valorem basis. The formula for the gasoline tax rate (GTR), in terms of the average pre-tax price (APTP) of all gasoline sold during the previous 6-month period (as of January 1 and July 1), is

$$GTR = 0.08\ (APTP - \$1.00) + \$0.10 \qquad (1)$$

rounded off to the nearest 1/10th cent, where

$$APTP = \text{Gross Sales} - (\text{State} + \text{Federal Taxes})/\text{No. of Gallons Sold} \qquad (2)$$