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BEFORE THE
POSTAL REGULATORY COMMISSION
WASHINGTON, DC 20268-0001

Institutional Cost Contribution Requirement for Competitive Products	Docket No. RM2017-1

REPLY COMMENTS OF BUSINESS OPTIMIZATION SERVICES
(March 10, 2017)

On November 22, 2016, the Postal Regulatory Commission initiated Docket No. RM2017-1 with the expressed purpose of evaluating whether the current requirement for the United States Postal Service (USPS) competitive products as a whole to fund at least 5.5 percent of USPS institutional costs should be upheld or revised. The Commission in its order invited comments from interested parties to assist the Commission in its deliberations. With respect to these products, the Commission has two important tasks to fulfill under Sections 3633(a)(3) and 3633(b) of the Postal Service Reorganization Act (PAEA). The former states that USPS competitive products in total should fund "what the Commission determines to be an appropriate share of the institutional costs of the Postal Service". The latter requires the Commission to evaluate every five years whether the current funding standard should be retained, modified or eliminated. In its determination, the Commission is mandated to take into consideration "the prevailing competitive conditions in the market, and the degree to which any costs are uniquely or disproportionately associated with competitive products."

On January 23, 2017, a number of parties filed initial comments either to support the current standard, eliminate it or to increase it substantially. With respect to the last, both United Parcel Service (UPS) and Federal Express (FEDEX) recommended raising the funding requirement from the current minimum of 5.5 percent of institutional costs to 29 and 30 percent, respectively. Both parties believe that a substantial portion of USPS institutional expenses support competitive product activities and therefore that raising the funding requirement to the recommended levels is appropriate. However, compliance with either proposal suggests that the USPS might have to increase competitive product rates significantly with largely detrimental consequences. The consequential magnitude of price increases could cause substantial market harm in several forms, undermining the clear intent behind 3633(b).

Business Optimization Services is a consulting firm dedicated to providing analytical services designed to promote efficient market outcomes. The company believes that both proposals would obstruct rather than support such outcomes and therefore should be rejected. The following reply comments address in more detail the major justification proposed by UPS and FEDEX for their recommendations, the possible magnitude of prices increases and the market injury these increases could cause.

BACKGROUND

The UPS and FEDEX propose many reasons in different forms for their proposals but it appears that most collapse in large part to what is termed the "the level playing field" argument or close variants to this argument. According to this argument, each firm in the competitive products market should be able generate sufficient revenue from its competitive products to cover all expenses incurred to produce and sell them. Otherwise, the violating firm gains an unwarranted competitive advantage in this market. If the advantage is sufficiently large, the disadvantaged firms may need to exit the market entirely because of an inability to generate surpluses (profits). The end result is higher market prices and possible misuse of resources, if the advantaged firm is cost inefficient.

According to UPS and FEDEX, the only firm that can gain such an advantage is the USPS. At least in theory, USPS has the potential for generating contribution from its market dominant products and using these funds to subsidize its competitive product operation. To prevent this, both parties propose that USPS competitive product revenues cover what the Commission now considers USPS competitive product incremental costs (competitive volume variable costs, infra-marginal costs and product-specific costs) and the portion of institutional costs caused by competitive product activities. Both parties claim that this sum would be the stand-alone costs that the USPS would incur if it only provisioned competitive products.

However, the USPS accounting system is not yet capable of attributing institutional costs to competitive products from a cost-causation perspective. Therefore, as a proxy, both parties propose that institutional costs be attributed to competitive products in the same ratio as competitive product attributable costs to total attributable costs. UPS proposes the most recent three year average for this percentage, while FEDEX appears to be content with a single year average. For the FY 2014 through FY 2016 period used by UPS, the three year average is 29 percent and for FY 2015 period used by FEDEX, the average is 30 percent.

COMMENTS

On what Are Now Considered Institutional Costs

Both parties raise the issue of cost causation with respect to institutional expenses which might not be adequately treated by the current procedure followed by the USPS in determining competitive product incremental cost. Because the USPS accounting system is unable to determine cost causation by individual product, the firm has followed the practice of attributing costs by cost component by conducting special studies and then updating results as necessary. In many cases, these studies consist of specifying or updating component-specific econometric cost models using data points that are closely bunched around the average of the data. In these cases, models may fit the data well around the specified data ranges, but outside these ranges the predictive power of these models declines appreciably. They are well designed to estimate marginal costs (cost of the last unit produced), and therefore to estimate volume variable costs as well, but not so well suited for estimating all costs "caused" by the presence of a particular product in isolation or a group of products – the product incremental costs.

The reason for this is that the shape of the curve implied by these models around the current data might not apply as given outside the data range. To accurately estimate incremental costs through an econometric approach, the shape of the cost curve should be known with some precision from zero volume to the current volume. Thus, absent data at volume ranges close to zero, the current models may not have the accuracy to estimate incremental costs reliably.

For purposes of section 3633 (a)(2) of the PAEA, a good incremental cost model should be able to answer the following question reliably - if all USPS competitive products were eliminated from the system what level of present USPS costs would be avoided? Undoubtedly, the USPS would have to restructure its operations drastically in “sizing down” to provision its market dominant services at an acceptable rate of efficiency. It is difficult to see how an econometric model can answer this type of question reliably.

To explain further with a simple example, suppose that total USPS annual costs for all products is $1,000. The USPS econometric cost models indicate that competitive and market dominant incremental costs are $200 and $400, respectively. The remaining $600 are classified as institutional. Also, suppose the Commission contracts for a study from a management consulting firm that specializes in organizational restructurings to answer two questions: a) of the total $1000, what costs would be avoided if the USPS exited the competitive product market but stayed in the market dominant market? and b) of the same total, what costs would be avoided if the USPS exited the market dominant market and stayed in the competitive market? As part of the study, the firm becomes very knowledgeable in all facets of the four major functional areas of USPS operations; a) mail collections, b) mail processing, c) mail transportation and d) mail delivery, and in all administrative functions that support these operations at headquarters and in the field. The firm also becomes familiar with important operational linkages within and across functional areas.

Based on this knowledge and available supporting data, the firm estimates competitive and market dominant savings of $300 and $600. These estimates are developed based on input from the USPS econometric models and a recommended restructuring and downsizing of administrative functions for each of the two scenarios. Thus, based on these recommendations, the Commission estimates that incremental and stand-alone costs are $300 and $400 for competitive products, and $600 and $700 for market dominant products.

Of course, the sum of the two incremental costs do not equal the total of $1000 because there are common costs of $100, now hidden in the institutional cost pool, that support one or both product classes. These costs are fixed both with respect to volume and the elimination of either product class. These are the true institutional costs that must be covered by USPS revenues from competitive and market dominant products. Based on the current standard, competitive product revenues would have to equal at least $305.5 =$300+.055*($100) for compliance with subsection 3633(a)(2).

Further, section 3633(b) states that the Commission shall conduct its review of the institutional cost burden imposed on competitive products by taking into account "any costs that are uniquely or disproportionately associated with competitive products." This reference appears to imply that some portion of institutional costs is connected or caused in some way by competitive products. However, if incremental costs are properly categorized, then institutional costs are only those common costs caused by both market dominant and competitive products. They cannot be said to be "caused" by competitive products alone in the ordinary sense of the word because the only way they can be avoided is for the USPS to cease all operations. If institutional costs only include common costs, there can be no cost basis to assign any share of institutional costs to competitive products. The level playing field to which UPS and FEDEX refer has been created by the proper categorization of incremental costs.

On the Competitive Product Institutional Funding Requirement based on an Evaluation of Current Market Conditions

Based on Section 3633(b), the Commission also has a market basis for assigning some share of institutional cost funding to competitive products. The Commission is required to evaluate current market conditions and determine if one or more parties have sufficient market power to impose and sustain anti-competitive rates. These rates need not be below incremental cost, but they would be sufficiently low to cause remaining competitors to exit the market or be marginalized to the point of having no or little market influence. The end result would be higher rates imposed on the market because of market dominance by the perpetrating firm or firms. If the USPS were capable of this type of pricing, then according to section 3633(b), the Commission can impose an added cost burden on competitive products by assigning some share of institutional cost funding.

The usual argument cited for the possibility of anti-competitive pricing by the USPS is that the firm enjoys very low unit costs because of massive scale and scope effects gained from serving the closed market for market dominant products. In theory, the USPS would enjoy some cost advantage for this reason, *all other things being equal*. However, all other things are not equal. The USPS is burdened with high operational and administrative costs due to factors over which it has no control. Upon passage in 2016, the PAEA required the USPS to fund the Postal Service Retiree Health Benefits Fund by over $5B in added expenses every year. Then shortly after passage of the legislation, the US economy suffered a massive recession that caused an accelerated decline in mail volume lasting several years. This decline was on top of the secular decline already in place from electronic diversion. Suddenly, the Postal Service was burdened with substantial overcapacity and much higher unit costs than anticipated because of a reverse scale and scope effect. Additionally, it is a well-known fact that there have always been large wage and benefit differentials between the USPS and both UPS and FEDEX.

The added costs imposed on the USPS relative to its competitors are heavily in evidence in the latest set of financial statements.

According to the latest 10K statements filed by the parties, USPS suffered an operating loss of $5.4B for fiscal year ending in September 30, 2016, while the UPS operating income for the 2015 calendar year was $7.7B and the FEDEX income for the fiscal year ending in June 30, 2016 was $3.1B.[1] With these results, it is difficult to argue that the USPS is somehow in a position of competitive advantage relative to its rivals. No business can sustain losses like the USPS has sustained over the past 10 years and still expect to survive without serious market injury.

The evidence is clear that USPS is in a disadvantaged market position and is the party subject to harm from anti-competitive pricing from its rivals. Both UPS and FEDEX are well positioned to lower rates substantially, if they so chose. The USPS can respond by keeping rates the same and lose substantial volume or lower rates to protect market share. In either case, the USPS would suffer serious injury. Its long term presence in the competitive products market might be in jeopardy, especially if its pricing flexibility were impaired artificially by imposing the funding of any portion of institutional cost.

[1] USPS 10K Statement for FY 2016, p. 12; UPS 10K Statement for CY 2015, p. 24; FEDEX 10K Statement for FY 2016, p. 43.

On Possible Competitive Product Market Consequences from Funding 30 Percent of USPS Institutional Costs

In order to get some perspective on possible price impacts if the FEDEX recommended 30 percent institutional cost share were accepted, a scenario analysis was performed to determine: a) whether compliance is possible under different price elasticity assumptions, and if compliance is feasible, b) the minimum across the board percent price increase needed for USPS competitive products. Several key assumptions were made to develop results. First, competitive product categories indicated in the Commission's FY 2015 Financial Analysis of the USPS were used to lump competitive products into two broad market categories: a) letter market - consisting of priority and priority express mail and b) package market – consisting of First Class Packages, Ground Parcels and International.[2] Different price elasticities were assigned by market to determine (a) and (b) above by scenario. Elasticities for products inside each market are assumed the same for each scenario. Also, to keep the analysis manageable within the time available, UPS and FEDEX are assumed to keep their rates constant in response to USPS price changes.

Results are presented below in TABLE 1 using FY 2015 competitive products financial data from the cited Commission report.

[2] Financial Analysis of the United States Postal Service, Financial Results and 10K Statement FY 2015, March 29, 2016, p. 71.

The estimation methods used are described in detail in the appendix to these comments and detailed results tracking to the estimation methods are shown in the filed library reference.

Contribution Maximizing Percent Price Increases for Competitive Products by Demand Elasticity Scenario

Package Elasticities										
Mail	-.25		-.50		-.75		-1.0		-1.25	
Elasticities	Price	Share	Price	Share	Price	Share	Price	Share	Price	Share
-0.25	186.7%	53.8%	120.9%	38.5%	87.5%	30.9%	67.3%	26.3%	53.8%	23.2%
-0.50	119.2%	38.3%	86.7%	30.8%	66.9%	26.3%	53.6%	23.3%	44.0%	21.1%
-0.75	85.9%	30.8%	66.5%	26.3%	53.4%	23.3%	43.9%	21.2%	36.7%	19.6%
-1.00	66.1%	26.3%	53.2%	23.3%	43.8%	21.2%	36.7%	19.6%	31.1%	18.4%
-1.25	53.0%	23.3%	43.7%	21.2%	36.7%	19.7%	31.1%	18.5%	26.7%	17.5%

TABLE 1

To calculate whether compliance is possible for each elasticity scenario, the maximum increase in contribution yielded by an across the board equal percent price increase on all products was calculated and then this value was divided by total FY 2015 institutional costs. The resulting set of values are the maximum share of institutional costs that can be funded from competitive products by scenario. These values and the accompanying percent price increases are shown in the table.

Notice that compliance is feasible only in six cases where demand elasticities are low enough to contain volume losses resulting from price increases. In the remaining cases, compliance is not possible because the implied volume losses from the higher elasticities are too severe. In cases with possible compliance, the minimum percent price increases required for compliance are lower than those shown in the table, but they are still substantial. These are indicated in the appendix.

It is clear that in all cases, the USPS would need to increase product rates by large percentages to either comply outright or minimize the gap between the actual funding share and the imposed requirement. However, the assumption that UPS and FEDEX keep rates the same is only a special case. In all likelihood, both competitors would respond by changing their own rates to increase profits even further in the long-run.

As suggested earlier, one or both competitors might opt for large price reductions in order to marginalize the USPS presence in the market through large volume losses. This anti-competitive strategy would be viable if short term lower profits, resulting from lower rates, are more than offset by higher long term profits yielded from imposing higher rates once again. Additionally, compliance with the 30 percent funding share would be impossible at least for the foreseeable future. The USPS would be hard pressed to produce any contribution over incremental costs, much less have any excess for partial coverage of institutional costs. A less risky and therefore more likely scenario would be for UPS and FEDEX to increase rates. USPS compliance with the 30 percent funding share would be easier. However, these results would also be unacceptable because of the serious harm caused to shippers by the across the board rate increases in the industry.

Conclusion

Both UPS and FEDEX have complete pricing flexibility for their products. The USPS should be afforded the same pricing flexibility to compete successfully in the only market where future growth appears certain, as long as revenues cover true incremental costs in the competitive product market. For these reasons, the Commission should reject UPS and FEDEX recommendations. Further, the current 5.5 percent institutional cost sharing requirement for competitive products should be eliminated entirely after institutional costs are revised, if necessary, to properly include only costs that are common to market dominant and competitive products.

Respectfully Submitted,

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