potentially available through the capacity release market will have little or no effect on a pipeline's long-run market power. They may, however, have a strong effect on either the primary capacity holder's (i.e. LDC's) or the pipeline's ability to exercise market power in the capacity release market, the short-term firm market, or the IT market. For these services, there are very few existing long term contracts. Moreover, a major interstate pipeline may have 10 to 20 different holders of FT capacity within a zone. Flexible (secondary) firm receipt and delivery point rights, in concept, give any of these primary holders or their replacements the ability to move gas to any upstream city-gate on the system. Thus, the secondary market in FT may well be unconcentrated. If released FT can be shown to be a good substitute for IT or short-term FT from the pipeline, then the released FT, IT and short-term FT market will be unconcentrated.

Any such arguments would depend on the effectiveness of the capacity release program in making released capacity at least the equal of IT. While it is doubtful that any such showing could be made now, with further improvements in the capacity release program this could occur.

In addition, part of the showing must contain evidence that LDCs could not frustrate "secondary firm" firm deliveries made at their city-gates by controlling the flows behind their own city-gate delivery points. Flexible receipt and delivery points are the key to a competitive finding; if an LDC is, aside from the pipeline, the only source of FT to its city-gate then it has market power. If secondary firm is an effective alternative, however, then there is a good likelihood that these markets would pass the stringent tests laid out above.

Some market-center services, such as short-term switching and parking, may also pass the test. Market-centers, by their nature, are where many pipelines intersect and, often, where there are multiple suppliers of storage service. In such cases, it is likely that the providers could show that customers will have many good alternatives at the market-center itself or in nearby market-centers.

In conclusion, application of the standards laid out in part IV.A is likely to mean continued cost-based regulation of primary FT, but may permit market pricing for released FT, IT and short-term FT and for market-center services such as switching and parking.

All-in-all, the potential for further reliance on market pricing is rather modest. On the other hand, market pricing in the capacity release and market-center services markets could be a key to their success. Hubs could play an important role in further perfecting the spot market for gas, but to do so is likely to require creative approaches to new services and new ways of adding value to the gas commodity. Creative, economical, new services are far more likely to develop under market pricing than under a cost-of-service approach.

D. Review of Market Power Findings

As discussed in part I, an important factor to the court of appeals in Elizabethtown, in which the Commission permitted gas sales at market prices, was the Commission's assurance that it would exercise its section 5 authority if necessary to assure that the market price was just and reasonable. This means that the Commission must consider how it will monitor market-based rates so that it can exercise its oversight responsibilities.

In past cases the Commission established, on a case-by-case basis some reporting requirements for companies authorized to charge market based rates.66 The Commission may want to consider developing standard periodic reporting requirements on prices and quantities in market-based transactions. Periodic reports would make it possible for the Commission to monitor market-based rates to ensure that the rates are within a zone of reasonableness. The Commission may also want to establish a more formal procedure for reporting changes in circumstances that could affect the market power finding, i.e., circumstances that reduce the number of good alternatives in a market.67 If circumstances change the Commission could either reconsider its prior market power findings or wait until a complaint is filed to take action.

Appendix: Analysis of Other Industries

As discussed in the paper, the FERC has consistently used the same general framework to evaluate when the market, rather than cost-of-service rate regulation, could be relied upon to produce just and reasonable rates. This framework has been evolving for over one hundred years in antitrust litigation and analysis and has now been codified in the DOJ/FTC merger guidelines. FERC is neither the first agency to choose light-handed regulation where a lack of significant market power can be shown, nor the only one to use antitrust standards as a framework for the showing. The general framework, however, is far from a set of mechanical rules; the application of the framework to a particular industry calls for many specific decisions and to an individual case requires many judgement calls.1

The Interstate Commerce Commission (ICC), the first national regulatory agency and pioneer in cost-of-service ratemaking, was also among the first to move toward deregulation or light-handed regulation for railroads and trucks. About twenty years ago the ICC began to lessen or eliminate regulation of railroads and trucks, the FCC allowed new entrants to compete for long distance telephone service and the CAB relaxed its price and entry controls over the airlines. The experience of these three agencies may provide some useful guidance for the Commission in deciding whether certain natural gas pipeline transportation services should be permitted market-based pricing and, if so, how those services should be identified.

Railroads, airlines, long distance telephones and natural gas pipelines all have much in common besides being regulated. They are all transportation/transmission networks characterized by a high ratio of fixed to variable costs, making "load factor" the key to unit operating costs, and, with the possible exception of airlines, all have significant economies of scale (an element of "natural monopoly"). However, there are also significant differences among all of these industries so analogies and policy conclusions based on their similar characteristics should be made cautiously.

A. Interstate Commerce Commission Regulation of Railroads

Railroads and natural gas pipelines have some important characteristics in common. Both transport using assets that are immobile once they are constructed, though railroads invest in "rolling stock" as well track and roadbed. Further, both exhibit the same "natural monopoly characteristic" that the construction costs necessary for one company to transport a given amount between two points are usually significantly

⁶⁶ For example, Transwestern was required to file monthly reports of market based sales under Rate Schedule ISS. 43 FERC ¶ 61,240 (1988). Buckeye was required to file annual reports showing rates, volumes, and revenues for each destination market. See 66 FERC ¶ 61,348, for a review of these reports. For electric utilities, the Commission has required power marketers selling at market based rates to file quarterly reports showing prices and quantities for individual transactions [e.g., *Heartland*, 68 FERC ¶ 61,223 (1994)]. Among other things, the reports are intended "to provide for ongoing monitoring of the marketer's ability to exercise market power."

⁶⁷ For example, assume in the original market power analysis the Commission found there were four good alternatives in an origin market. A subsequent corporate merger of two of the pipelines and the abandonment of facilities by another would reduce the number of good alternatives to two. There have been no new entrants into the origin market. These changes probably would significantly affect the continuing validity of the original market power finding.

¹Judge (now Justice) Stephen Breyer gives an example of how a merger "pessimist" might assess a proposed airline merger quite differently from a merger "optimist," though both use the same antitrust framework and agree on all the facts. See discussion of the interplay between antitrust and deregulation of the airline and telephone industries in his contribution to the "Symposium: Anticpating Antitrust's Centennial: Antitrust, Deregulation and the Newly Liberated Market Place," 75 California Law Review 1005–1047 (May 1987).