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Cost of Nursing Home Regulation:

Building a Research Agenda

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Government regulations are adopted to protect the public welfare, particularly those vulnerable populations less able to exercise knowledgeable free choice. When consumers of products and services cannot be expected to have the necessary information and sophistication to select a good product or service that will not harm them, government is expected to establish mechanisms to protect consumers. This role ranges from food safety to licensure of professionals, whether electricians or physicians.

Unlike physicians or hospitals, the regulation of “household” services was a late entrant, as it was presumed that individuals who could purchase this help could discern quality and switch, if necessary. Furthermore, if not done by family directly, it occurred on the fringes of the formal economy, dominated by semi-informal relationships of friends or neighbors willing to help out for a fee. As long as families were able to care for those unable to manage alone, the scope of paid arrangements such as residential care homes or “live in” caretakers remained relatively small. Voluntary or religious organizations served those in more formal structures but, as it was assumed that the interests of their charges were paramount, the state rarely intervened.

Rapid aging of the population, economic migration and mobility, reductions in the fertility rate, and increases in survival among those born disabled have permanently altered the scope of care giving arrangements in modern societies. As the numbers of dependent individuals increased, informal arrangements and the occasional government and religious sponsored institutions were inadequate to meet the growing need for care. Before the introduction of Medicare and Medicaid, state regulation of nursing homes existed, but varied dramatically across the country.¹

After the introduction of Medicare and Medicaid financing of nursing homes, the impetus for nursing home regulation gradually was transferred to federal authority, under the “power of the purse.” Although some states have increased their standards beyond the federal requirements, despite the fact that there is considerable interstate variation in implementation, the Centers for Medicare and Medicaid largely dictate inspection protocols, frequency and the definitions of what constitutes a violation of quality standards.² The cost of the resulting regulatory structure also varies more than 7 fold from state to state.³ Despite the costs of the regulatory process, most people complain about it with advocates maintaining it is insufficiently stringent, allowing “bad apples” to operate, whereas nursing home operators maintain that it is too intrusive and inconsistently applied.^{4,5} Advocates demand that Centers for Medicare and Medicaid and state inspectors sanction facilities, forcing them to comply, particularly by spending more on more skilled staff, whereas

industry proponents argue that paper and process compliance costs are excessive without commensurate benefit and that they actually detract from quality by taking away skilled staff time away from direct care.

To date, these arguments have not been supported by data. The study by Mukamel et al⁶ on the costs of nursing home regulation to the facilities themselves makes a tremendous contribution by opening a whole new domain of research on a fundamentally important topic that, interestingly enough, heretofore has not been explored. They were able to estimate the relationship between “direct” operating costs and regulation because of their use of 3 years of data over which each state's relative aggressiveness of regulatory zeal varied. This longitudinal approach overcomes some of the problems of a strictly cross-sectional design, making it possible to “identify” that component of cost variation attributable to within state variation in regulatory intensity.

The author's measure of relative stringency is obviously a conservative estimate of regulatory intensity, as it is exceedingly unlikely that the “direct” cost of regulation in the most lax of regulatory conditions is 0. In the absence of a condition of “no regulation,” any estimate of the cost of regulation is really hypothetical and only meaningful relative to variation around the average level of stringency and therefore clearly underestimates the cost of regulation. Furthermore, it is unlikely that the relationship between stringency and cost is strictly linear. Rather, some aspects of compliance, upgrading to meet physical plant requirements may be costly and essential, but are 1-time costs; whereas establishing and maintaining reporting systems or meeting staffing standards are ongoing both to recruit and retain scarce skilled staff.

As importantly, the composite stringency measure the authors use incorporates some dimensions that are not highly correlated (as seen in the correlation matrix they present), suggesting interstate variation in how the different aspects of intensity are implemented. This means that some states apply monetary penalties even in the absence of a large number of regulatory deficiencies, whereas others rarely apply monetary penalties. If this is the case, some of the indicators of stringency may be more strongly related to direct costs than others, suggesting that the results reported by Mukamel et al may further underestimate the cost of regulation due to multidimensional characteristics of regulatory stringency. As there is evidence that states' practices viz. regulatory stringency vary over time and occasionally in response to legislative changes, it would be fascinating to break down the longitudinal data to estimate the effect of a fine or a sudden increase in regulatory citations on future costs. The most obvious component of costs to examine would be increases in skilled labor costs, but this would have to take local labor market circumstances into consideration, requiring even more data and a longer series.

As Mukamel et al suggest in their discussion, we also need to better understand the relationship between cost and nursing home quality. Earlier study by Weech-Maldonado et al^{7,8} found that, depending upon the patient outcome of interest, costs rise and then either plateau or fall with increasing quality. But, the measure of quality used was necessarily relative, further complicating any effort to determine how much it costs to provide minimum standard care versus the marginal cost of each additional meaningful grade of subsequent improvement. A recent study by Mor et al⁹ reported that quality across a number of indicators (although not all) improved more in states which increased their Medicaid payment rates relatively more than it did in states that did not. As the baseline rate of reimbursement was much lower in states that raised their rates relatively more, it is likely that the marginal returns to quality of increasing reimbursement declines.

These studies reinforce calls for better measures and understanding of quality in long-term care. However, the evidence suggests that we are unlikely to find a single satisfactory measure of quality both in light of the increasingly heterogeneous populations using nursing homes and the multidimensional nature of quality.¹⁰ Most admissions to United States nursing homes are no longer in the facility 90 to 100 days later, but it is still the case that most bed days are attributable to the traditional long-term care resident, although even she is becoming that much sicker and frail.^{11,12}

Mukamel et al are correct in calling for substantially more research on the manner in which regulatory intensity, nursing home costs, and patients' quality experiences are interrelated. However, this research agenda is necessarily iterative, and just as there may not be a single right approach to measuring regulatory intensity and residents' experiences of quality, which aspects of facility costs to consider as affected by regulation and being sensitive to measuring investments in quality may not be readily apparent. The next step in the effort to understand these interrelationships may be to focus on 1 aspect of quality that is likely most sensitive to one readily measured component of costs whose deficit is most likely reflected in particular types of regulatory inspection deficiencies. Given the increasing importance of Medicare reimbursed hospitalizations as a reflection of quality problems, one might begin by examining hospitalizations of long stay residents as a quality outcome of interest, skilled staffing as an investment cost, and deficiencies related to clinical care processes.^{13,14} Better understanding of how other dimensions of quality are influenced by facility costs and regulatory environment can be readily formulated in constructing a more disaggregated perspective of the fundamental questions Mukamel et al address. It seems to me that only by first understanding how the component parts fit together are we in a position to decide whether it is useful to formulate an omnibus perspective. This study is important for both the policy makers and regulators and for the long-term care industry altogether. They are in the trenches trying to deliver care to a complex population, they end up trying to respond to regulators who, in turn, are often responding to political pressure to be more stringent, without necessarily truly understanding precisely how risky each deficiency is. More informed and careful analysis could benefit all sides of this debate.

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