

Economic and Organizational Research Focused on Medical Group Practices

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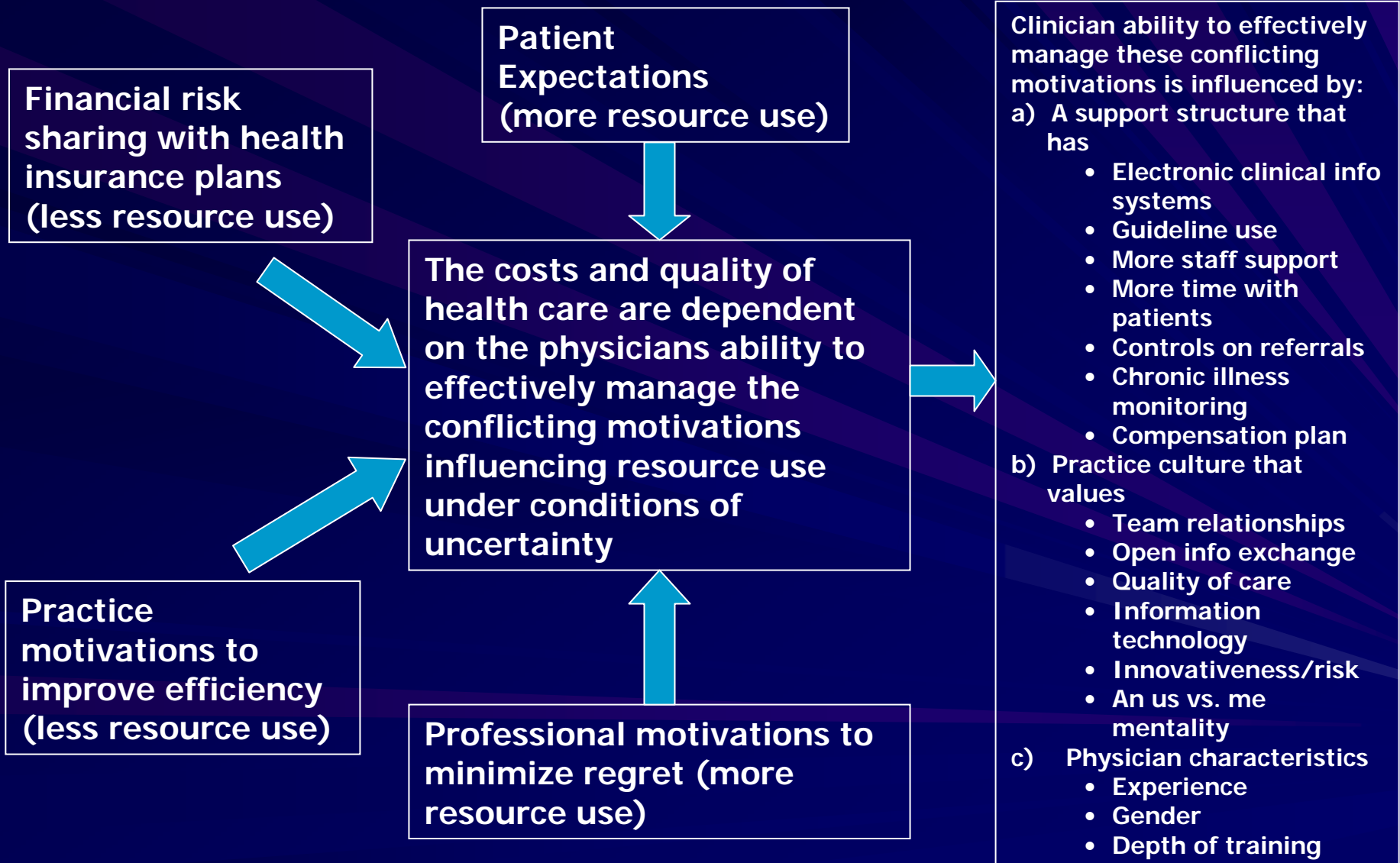
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Will cover four areas:

- A conceptual model for group practice research
- Variable measurement and specification challenges
- Causality issues
- Two projects that dealt with these issues

The Influence of Practice Organizational Factors on the Cost and Quality of Care



Purpose

To assess the effects of payment methods at the group practice and physician levels on costs of care when clinic, patient and physician characteristics are controlled.

Data Sources

Minnesota Blue Cross — 1996

- 86 group practices
- 57,123 patients
- Claims data (adjusted)
- Survey of practices
- Blue Cross patient and physician files

Analytic Model

Dependent Variable

- Per member per year costs
 - Adjusted for case mix and differences in payment rates

Analytic Model (cont.)

Group Practice Explanatory Variables

- Clinic payment
 - Sources of revenue
- Physician payment
 - Factors used to determine compensation
- Clinic characteristics
 - Size, part of system, for profit
- Clinic resource control programs
 - Disease and demand management
- Physician characteristics
 - Years experience, gender, specialty

Regression Estimates Creating a Corrected Capitation Clinic Payment Variable (n = 86 clinics; 57,123 patients)

<i>Model</i>	β	<i>Std. Error</i>	<i>T</i>	<i>p-Value</i>
Constant	5.890	11.917	.494	.622
Clinic part of any system	13.376	4.702	2.845	.006
Number of difference specialties at clinic	-.479	.213	-2.249	.027
Mean number of years MD experience	-.445	.625	-.712	.479
Years experience with capitation or other financial risk payment	1.148	.482	2.384	.020
Clinic is in urban zip code	10.804	4.544	2.378	.020

Dependent variable: sum of all forms of capitation clinic payment
Adjusted R² = .28

Findings

Group practices with:

1. More revenue derived from capitation payment have lower costs.
 - More revenue from fee for services payment with withhold provisions also lowers costs but not as much as cap.
2. More physician compensation based on some share of clinic net revenue have lower costs.
 - This is enhanced if related to resource utilization factors.

Findings (cont.)

3. More experienced physicians have lower costs.
4. Higher proportion of primary care physicians and those that have more women physicians have higher costs.
5. More clinical guidelines and those that use more physician profiles have lower costs.
6. Those that are part of hospital or group practice systems have higher costs.

Purpose

To determine how the structure and culture of medical group practices influence prescription drug errors.

Sources of Data

- Prescription drug claims data (n = 244)
- Group practice structure survey (n = 127)
- Group practice culture survey (n=148)

Medical Group Practice Culture Components and Associated Statements (Short Form)

Scoring Form

Place the items from the survey in these categories and calculate the mean score for each category.

Collegiality

1. A great deal of sharing of clinical information.
2. A close collegial relationship among the physicians.

Information Emphasis

1. We have an electronic information mentality.
2. We emphasize the collection and analysis of clinical data to improve our practices.

Medical Group Practice Culture Components and Associated Statements (Short Form)

Scoring Form (cont.)

Quality Emphasis

1. Adverse patient care events are always discussed with the relevant clinicians.
2. Our administrative decision making process can be best described as consensus building.

Cohesiveness

1. A strong sense of belonging to the group.
2. An identifiable practice style that we all try to adhere to.

Medical Group Practice Culture Components and Associated Statements (Short Form)

Scoring Form (cont.)

Organizational Trust

1. We can count on being treated fairly.
2. There is a high degree of organizational trust.

Adaptive

1. We easily adapt to changes in the field.
2. We are quick to adopt new techniques and practices.

Medical Group Practice Culture Components and Associated Statements (Short Form)

Scoring Form (cont.)

Autonomy

1. An emphasis on physician individuality; each physician has the right to practice according to his/her own style.
2. A feeling that we are each autonomous clinicians, but practicing in the same organization for support services.

Business

1. Bottom line considerations influence most of our decisions regarding what services to offer and how to provide them.
2. We view ourselves more as a business than as a community health center.

Findings

1. About 30% of the prescriptions had some type of error (18% if overdose dropped)
2. There are more errors if:
 - More patient scheduled per hour
 - Patients get more prescriptions
 - Practice is in rural area
 - There is a collegial culture
3. There are fewer errors if:
 - Have a case manager
 - Have an autonomy culture
 - Have a cohesive culture

What do we know about the organizational culture of medical group practices?

1. Practices have an identifiable culture and it can be measured
2. Can be used to determine fit of technologies, physicians, and other practices
3. Different dimensions influence different measures of performance

What do we know about the organizational culture of medical group practices?

4. Drug errors

- Collegiality increases errors
- Cohesiveness decreases errors
- Autonomy decreases errors

5. Patient satisfaction

- Adaptive decreases satisfaction with time with doctor
- Autonomy increases satisfaction with time with doctor
- Quality decreases "would recommend"
- Adaptive increases "word recommend"