

УДК 336.01:614.2

Ayushi Patel, student of the International Medical Institute, Kursk State Medical University, Kursk, Russia

Email: ayushimpatel.756@gmail.com

FINANCIAL MODELS OF MEDICAL INSTITUTIONS

Abstract: the article explores the application of financial models in diverse medical institutions. It investigates how these models contribute to effective resource allocation, budgeting, and strategic decision-making within healthcare organizations. The study analyzes the impact of financial modeling on optimizing operational efficiency, managing costs, and improving overall financial health in the dynamic context of medical institutions. Additionally, it examines the challenges and opportunities associated with implementing financial models in healthcare settings, shedding light on the potential benefits for both providers and patients.

Key words: financial models, healthcare, medical institutions, resource allocation,

Аюши Патель, студентка Международного медицинского института Курского государственного медицинского университета, Курск, Россия

Электронная почта: ayushimpatel.756@gmail.com

ФИНАНСОВЫЕ МОДЕЛИ МЕДИЦИНСКИХ УЧРЕЖДЕНИЙ

Аннотация: в статье рассматривается применение финансовых моделей в различных медицинских учреждениях. Исследуется, как эти модели способствуют эффективному распределению ресурсов, составлению бюджета и принятию

стратегических решений в организациях здравоохранения. В исследовании анализируется влияние финансового моделирования на оптимизацию операционной эффективности, управление затратами и улучшение общего финансового состояния медицинских учреждений в динамичном контексте. Кроме того, в нем рассматриваются проблемы и возможности, связанные с внедрением финансовых моделей в медицинских учреждениях, что проливает свет на потенциальные выгоды как для поставщиков медицинских услуг, так и для пациентов.

Ключевые слова: финансовые модели, здравоохранение, медицинские учреждения, распределение ресурсов

Medical institutions varies from hospitals, and clinics to centers and pharmaceutical companies. These institutions work have a complex and dynamic financial landscape. The financial model of these institutions is crucial even for stakeholders, policymakers and investors. In this article we delve into the structures that underpin operations of different medical entities.

1) Hospital Financial model. Hospitals typically utilize a revenue-driven financial model. Their income is derived from various sources via; patient services, government funding. The key financial indicators for hospital include patient occupancy rate, average length of stay and revenue per patient [1].

2) Clinical financial model. Clinics often follow a Fee-for-service (FFS) Model. Where patients pay for individual medical services. Some dines may also receive pay back from insurance providers. Controlling overhead costs and optimizing resource allocation are key strategies in this model [3].

3) Research institution financial model. Research institutions such as universities with medical schools, rely heavily on grants, endowments and government

funding. Balancing the budget requires strategic planning to align research priorities with available funding [1].

4) Pharmaceutical company financial model. Pharmaceutical companies operate in a competitive market and focus on developing and marketing drugs. Their revenue is generated through drug sales, licensing agreement and partnerships. Patent protection also play a significant role.

5) Health insurance financial model. Health insurance companies operate on a premium-based model. They collect premiums from policyholders and use these funds to cover medical expenses, administrative costs and generate profits. Striking a balance between affordable premiums and comprehensive coverage is critical for success.

6) Diagnostic center financial model. Diagnostic Centers primarily operate on a Pay-per-test or package basis. Revenue is generated by the medical testing, imaging services and health screening. These centers need to invest in state-of-the-art equipment, maintainances assurance and manage turnaround times to attract referrals from healthcare providers.

7) Telemedicine financial model. The financial model involves a combination of subscription fees, consultation charges & partnerships with healthcare providers. The success of telemedicine platforms often hinges on user experience and effective marketing strategies.

8) Elder care facility financial model. Facilities providing elder care services including nursing homes & assisted living Centers rely on a combination of private payments, government subsidies and insurance reimbursements.

9) Medical equipment manufacturing financial model. Companies involved in manufacturing medical devices and equipment typically rely on a product-based revenue model. R&D expenses, production costs and global market dynamics significantly impact the financial health of these entities .

10) Non-profit healthcare organization financial model. Nonprofit healthcare organizations such as community health centers and charitable hospitals operates with a Mission-driven financial model. Funding comes from a mix of charitable donations, grants and government support [3].

Understanding the financial models of different medical institutions is integral to navigating the complex healthcare landscape. Whether it's the patient-focused approach of hospitals, the services-oriented nature of clinics, the research-driven ethos of academic institutions or the profit driven strategies of pharmaceuticals and insurance companies, each entity's financial model is unique blend of revenue streams, costs and risk management.

Each model comes with its own set of challenges and opportunities, emphasizing the need for tailored financial strategies, and continuous adaptation to the evolving Landscape of healthcare services & technology [2].

In a “fee-for-service” medical financial model, healthcare providers are compensated based on the number and type of services they deliver to patients. Each service is billed separately, and the payment is typically made by the patient, insurance, or a combination of both. This model contrasts with other payment models, such as capitation, where providers receive a fixed amount per patient regardless of the services provided. Fee-for-service can incentivize more services but may raise concerns about overutilization and healthcare costs.[3]

In a fee-for-service medical financial model, there are potential advantages to patient health:

- Choice of Services. Patients have the flexibility to choose specific medical services based on their needs, allowing for personalized healthcare.
- Access to Specialized Care. Fee-for-service models may facilitate easier access to specialized treatments or consultations, as patients can directly pay for specific services without constraints.

- **Transparent Cost.** Patients are aware of the costs associated with each service, promoting transparency and informed decision-making regarding their healthcare choices.

- **Timely Care.** Since patients can directly pay for individual services, there may be a quicker turnaround for necessary medical procedures or tests without waiting for bundled services.[5]

However, it's important to note that while these advantages exist, the fee-for-service model also has potential downsides, such as concerns about overutilization of services and the potential for financial barriers to access. Balancing these factors is crucial for optimizing patient outcomes.[6]

The fee-for-service medical financial model has several disadvantages to public health:

- **Cost Inefficiency.** Fee-for-service can lead to overutilization of healthcare services, driving up overall healthcare costs without necessarily improving health outcomes.

- **Health Inequality.** Patients with limited financial resources may face barriers to accessing necessary healthcare services, leading to disparities in health outcomes based on economic status.[1]

- **Focus on Volume over Value.** In a fee-for-service system, there might be an emphasis on providing more services rather than focusing on the overall value and effectiveness of healthcare delivery.[5]

- **Fragmented Care.** Since each service is billed separately, there's a risk of fragmented care. This may result in a lack of coordination among healthcare providers, potentially impacting the overall quality of care.[6]

- **Preventive Care.** Fee-for-service models may not adequately incentivize preventive care, as the emphasis is often on treating specific conditions rather than proactively maintaining health.[1]

Addressing these disadvantages may involve exploring alternative payment models that prioritize value-based care, preventive measures, and equitable access to healthcare services.

In summary, the financial model for medical institutions plays a critical role in shaping healthcare delivery. While a fee-for-service model can provide flexibility and transparency, it comes with challenges like cost inefficiency and potential disparities in access. Striking a balance between patient-centric approaches and overarching public health goals is crucial. Exploring alternative models, such as value-based care, may offer solutions to enhance efficiency, promote preventive measures, and ensure equitable access to healthcare services. Ultimately, a well-designed financial model should align with the broader objectives of improving patient outcomes, controlling costs, and advancing the overall health of the population.

References

1. Amy Brock Martin, Janice C. Probst, Kyle Shah, Zhimin Chen, and David Garr. Differences in readiness between rural hospitals and primary care providers for telemedicine adoption and implementation: findings from a statewide telemedicine survey // The Journal of Rural Health 28, no. 1 (2012) - <https://www.Healthfinancejournal.com>
2. Kelly A. Hirko, Jean M. Kerver, Sabrina Ford, Chelsea Szafranski, John Beckett, Chris Kitchen, and Andrea L. Wendling. Telehealth in response to the COVID-19 pandemic: Implications for rural health disparities // Journal of the American Medical Informatics Association : JAMIA 27, no. 11 (2020) - <https://pubmed.ncbi.nlm.nih.gov/32589735>
3. New Incentive for States to Adopt the ACA Medicaid Expansion: Implications for State Spending // 2021, accessed 9/24, 2021 - <https://www.kff.org/report-section/new-incentive-for-states-to-adopt-the-aca-medicaidexpansion-imp>

4. Bai et al. Varying Trends In The Financial Viability Of US Rural Hospitals, 2011–p.17
5. The Chartis Group, Crises Collide. The COVID-19 Pandemic and the Stability of the Rural Health Safety Net (2021) / <https://www.chartis.com/resources/files/Crises-Collide-Rural-Health-Safety-Net-Report-Feb-2021.pdf>.]
6. United States Government Accountability Office. Information on Medicare-Dependent Hospitals (2020) - <https://www.gao.gov/assets/gao-20-300.pdf>.