# THE ROLE OF **PSAOs** IN THE PHARMACEUTICAL SUPPLY CHAIN





## **Elevate Provider Network**







## THE ROLE OF **PSAOs** IN THE PHARMACEUTICAL SUPPLY CHAIN

## ABOUT

This report was published on behalf of the PSAO Coalition, a coalition supported by HDA.



The Role of PSAOs in the Pharmaceutical Supply Chain

## **EXECUTIVE SUMMARY**

Since 2019, policymakers at the federal and state levels have become increasingly interested in pharmacy services administrative organizations (PSAOs) due to false rhetoric and myths shared by pharmacy benefit managers (PBMs). PSAOs manage the working relationships with third-party payers and/or PBMs and facilitate administrative support for independent pharmacies. The services PSAOs provide to independent pharmacies are essential to an independent pharmacy's ability to serve patients because it allows the independent pharmacist to focus on patient care instead of administrative work. Given the increased interest in PSAOs at the federal and state levels, this report will provide context to these entities' role within the pharmaceutical supply chain. Misconceptions about PSAOs have sometimes confused policymakers about their essential role and value within the pharmaceutical supply chain. At their core, PSAOs exist as an optional tool to assist independent pharmacies for a small monthly fee.

This report will examine the role of PSAOs, which is to assist independent pharmacies with administrative tasks, the value they create by saving independent pharmacies money and time, the services they provide to independent pharmacies, which include back-of-house services and contract evaluation, the efficiencies they create for pharmacies and other stakeholders, and common misconceptions surrounding PSAOs. PSAOs' purpose is to save independent pharmacies time and money so that independent pharmacies may best serve patients.

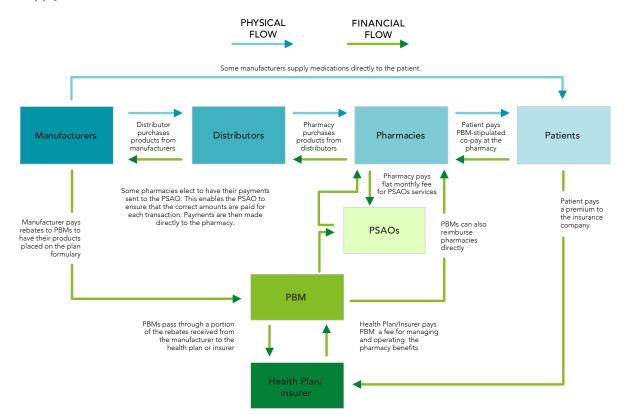
S	Some PSAOs are owned and operated by distributors; other PSAOs operate independently of distributors.
Z	PSAOs provide value in the pharmaceutical supply chain by bolstering the ability of independent pharmacies to access products better and serve patients.
Ο	PSAOs are a tool to assist independent pharmacies with administrative tasks and contract evaluation.
L L	PSAOs represent independent pharmacies in business interactions with third- party payers and/or PBMs.
Ű	Core PSAO services include contract evaluation, operational and transaction support, and analysis and forecasting.
	PSAOs help independent pharmacies operate by alleviating burdens on those pharmacies.

This report builds on the 2021 Avalere report entitled, "<u>The Role of Pharmacy Services Administrative Organizations for</u> <u>Independent Retail and Small Chain Pharmacies</u>."

### INTRODUCTION

The pharmaceutical supply chain includes the <u>product chain</u>, which is the physical flow of prescription medicines and products from the manufacturer to the patient, and the <u>payment chain</u>,<sup>1</sup> which is the financial flow surrounding prescription medicines. To summarize, the product chain is the flow of prescription medicine, while the payment chain is the flow of money.

**Figure 1**: Schematic of the physical (product chain) and financial flow (payment chain) of medical products in the healthcare supply chain.



Pharmacies operate within a complex pharmaceutical supply chain, including the physical product flow, financial flow, and contractual relationships. Hospital and health system pharmacies can provide services to both inpatients and outpatients within their respective hospitals or health systems. Retail pharmacies are typically split into two categories: retail chain and independent. An independent pharmacy is typically a pharmacist-owned and -operated small business, primarily providing direct pharmaceutical care to patients. A <u>retail pharmacy</u> dispenses prescription medications and includes chains, regional pharmacies like mass retail and grocers, mail-order, and online pharmacies.<sup>2</sup> In some cases, an independent pharmacy is part of the retail pharmacy business model.<sup>3</sup>



<sup>1</sup> The <u>National Community Pharmacists Association (NCPA) estimates</u> there were 19,432 independent pharmacies in 2023. <u>The</u> <u>Drug Channels Institute and NCPA's data differ</u> because they use different methodologies to count independent pharmacies; as a result, NCPA counts fewer independent pharmacies. Previously, NCPA used an analysis of National Council for Prescription Drug Programs (NCPDP) and NCPA research to calculate independent pharmacy locations. Beginning in 2021, NCPA began using IQVIA's state on U.S. retail pharmacy locations. Independent pharmacies often elect to contract with <u>pharmacy services administrative organizations (PSAOs</u>) to decrease their operational burden and better navigate the complex landscapes of the pharmaceutical ecosystem. PSAOs offer business and administrative solutions that benefit independent pharmacies, like a PSAO typically interacting with pharmacy benefit managers (PBMs) on behalf of independent pharmacies. By serving independent pharmacies and aggregating their voices, PSAOs can provide administrative efficiencies to allow independent pharmacies to use their limited resources better. The role of PSAOs and their services — assisting independent pharmacies to gain access to PBM networks — is essential to independent pharmacies, whose primary focus is serving patients.

This paper builds on the 2021 Avalere report, "The Role of Pharmacy Services Administrative Organizations for Independent Retail and Small Chain Pharmacies," which provided an overview of PSAOs. Since the report was published, interest in PSAOs and how they operate has increased. The following paper will explore the purpose of PSAOs and their benefits for independent pharmacies. Additionally, it will correct misconceptions surrounding PSAOs and clarify the services offered.

## THE PURPOSE OF PSAOs

PSAOs' primary function is to manage the working relationships with third-party payers and/or PBMs and facilitate administrative support for independent pharmacies. Moreover, <u>PSAOs offer</u> contract management, operational and transaction support, analysis, and forecasting. These entities' services are essential to independent pharmacies because over 90 percent of independent pharmacies' total sales are from prescription dispensing.<sup>4</sup> By alleviating burdens on independent pharmacies and providing <u>administrative assistance</u>, including contract evaluations,<sup>5</sup> they allow these small businesses to focus on their pharmacy customers and patient care. PSAO services are entirely optional, and no pharmacy is ever forced to use a PSAO; if an independent pharmacy owner prefers, they may contract directly with PBMs on their own.

## **ROLE AND CURRENT STATUS OF INDEPENDENT PHARMACIES**

Independent pharmacies provide vital healthcare services to rural and/or medically underserved communities and are an option for residents of larger communities. Approximately 80 percent of independent pharmacies serve patients in areas with less than 50,000 people.<sup>6</sup> Ninety percent of Americans live within five miles of a pharmacy.<sup>8</sup> Patients see their pharmacists 10 times more than other healthcare professionals, and pharmacists consistently rank as one of the most trustworthy, honest, and ethical professions.<sup>9</sup>

However, the number of independent pharmacies in the United States has decreased<sup>10</sup> by almost 50 percent, compared to the 40,000 independent pharmacies that were active in 1980.<sup>11</sup>,<sup>12</sup> The Rural Policy Institute found that from 2003 to 2018, 1,231 of 7,624 rural independent pharmacies closed.<sup>13</sup> The Drug Channels Institute estimates that the number of independent pharmacies has trended downward within the past five years.<sup>14</sup> The Drug Channel Institute estimates that over the past 20 years there are approximatively 20,000 to 21,000 independent pharmacy locations,<sup>15</sup> representing 12 percent of the pharmacy industry's revenue.<sup>16</sup>,<sup>1</sup> According to the 2022 Economic Report, independent pharmacies fill about 48,000 prescriptions annually per pharmacy.<sup>17</sup> In comparison, retail pharmacy chains fill about 138,000 prescriptions annually per pharmacy industry changes and grows, independent pharmacies' share of the pharmacy industry revenue is expected to decline.<sup>19</sup>

## WHAT IS A PSAO AND WHAT ROLE DO THEY PLAY?

<u>PSAOs serve as a valuable resource for independent and small pharmacy chains</u>,<sup>20</sup> with 83 percent of independent pharmacies voluntarily outsourcing some administrative tasks to a PSAO.<sup>21</sup> The primary function of a PSAO is to decrease the administrative burden on independent pharmacies for a <u>small monthly fee of about two hundred dollars</u>.<sup>22</sup> According to the <u>2021 Avalere report</u>, PSAOs are defined as an organization that evaluates and executes contracts and interacts with PBMs on behalf of and in support of participating independent pharmacies.<sup>23</sup>

Without PSAOs, many independent pharmacies would have to directly manage all of their contracts with PBMs and payers without any back-office support.<sup>24</sup> This would likely leave independent pharmacies overly burdened by administrative tasks, ultimately reducing their profitability and ability to serve patients.

## THE POWER OF PSAO EFFICIENCIES

PSAOs create meaningful efficiencies for independent pharmacies by providing administrative services and managing the relationship with the third-party payer and/or PBM. Many independent pharmacies are small businesses owned by licensed pharmacists. These business owners entered the profession to provide patient care and often don't have the time nor legal or contracting background to evaluate contracts with third-party payers and/or PBMs.<sup>25</sup> Through their back-office administrative assistance, PSAOs help ensure patients can access independent community pharmacies while supporting the pharmacies' ability to focus on patient care. More than 266 million Americans' prescription drug benefits are administered through PBMs.<sup>26</sup> It is critical that pharmacies, especially independent pharmacies, are accessible to Americans to prevent pharmacy deserts.

PSAOs do not prohibit an independent pharmacy that is part of a PSAO from having a direct relationship with a thirdparty payer and/or PBM. Occasionally, independent pharmacies in a rural location may individually secure contract terms directly with a third-party payer and/or PBM due to coverage requirements. Notably, large pharmacies evaluate contracts directly with PBMs and/or third-party payers — including those PBMs that own pharmacies.

PBMs often report that PSAOs have strong negotiation power, indicating that PSAOs negotiate effectively on behalf of independent pharmacies.<sup>27</sup> However, independent pharmacies tend to disagree with that claim because it implies that independent pharmacies are offered fair contracts because of PSAOs.<sup>28</sup> PBMs often offer contracts to independent pharmacies on a "take-it-or-leave-it" basis. In a 2013 study on PSAOs, the GAO found "over half of the PSAOs … reported having little success in modifying certain contract terms due to 'negotiations.' This may be due to PBMs' use of standard contract terms and the dominant market share of the largest PBMs. Many PBM contracts also contain standard terms and conditions that are largely non-negotiable."<sup>29</sup> Despite contract evaluation challenges, PSAOs allow independent pharmacies to better use their limited resources by creating administrative efficiencies and amplifying the voices of independent pharmacies with third-party payers and/or PBMs.<sup>30</sup>

PBMs often advocate for unnecessary regulation of PSAOs, which will ultimately result in harm to independent pharmacies and patient access. For example, Maryland enacted a state law in 2020.<sup>31</sup> That bill resulted in unintended consequences by overregulating PSAOs. <u>Maryland passed another law in 2022</u>,<sup>32</sup> to clarify that PSAOs do not have control over contracts, and that is the role of a PBM. With the <u>three largest PBMs representing 80 percent of Americans prescription drug benefits</u>,<sup>33</sup> a PSAO or independent pharmacy's negotiation power is minimal at best. As discussed later in the "Misconceptions about PSAOs" section, unnecessary regulation of PSAOs will make it harder for PSAOs to operate and serve independent pharmacies.

## **PSAO SERVICES**

PSAOs assist independent pharmacies with tasks that are difficult to navigate and often require subject matter expertise. PSAOs save independent pharmacies time and money by offering the following <u>services</u>:<sup>34</sup>

- **Contracting:** PSAOs manage business relationships with PBMs on behalf of independent pharmacies. PSAOs represent independent pharmacies in contract evaluations related to reimbursement, payment terms, price updates and appeals, and administrative requirements for third-party contracts. PSAOs also manage insurer and PBM relationships by fielding questions about claims, contracting, reimbursement, and payer/PBM audits.
- Pharmacy Payment Reconciliation: PSAOs ensure that independent pharmacy members are accurately identified by the PBM and provide the pharmacy with the transaction data as supplied by the PBM, which allows the pharmacy to ensure accurate reimbursement. Most PSAOs generate store-level customized reports to summarize activity and identify outstanding claims for independent pharmacies.
- Business Operations: PSAOs assist independent pharmacy members with understanding pharmacy-level requirements regarding compliance and credentialing.
- Central Pay: PSAOs can act as financial intermediaries between third-party payors to pharmacies, like PBMs. PSAOs collect the money from the claims filed with third-party payers and then send the funds to individual pharmacies.
  Each claim is accounted for down to the penny, and the PSAO provides a store-level report to the pharmacy, which pharmacies can utilize to identify any outstanding claims.

## **MISCONCEPTIONS**

PSAOs are facing increased interest from federal and state policymakers, primarily due to several misconceptions. The following focuses on some common misconceptions versus facts about PSAOs:<sup>35</sup>

#### Misconception: PSAOs and PBMs are the same and should be subject to the same regulations.

PSAOs and PBMs are stakeholders in the payment chain but perform very different roles because they are on opposite sides of pharmacy contacts. PBMs work on behalf of health insurers to negotiate prescription drug prices and develop prescription drug formularies. Prescription drug formularies delineate what medications a health insurer covers and at what cost. PBMs have come under scrutiny due to concerns that their business model and negotiated manufacturer rebates have raised the prices of prescription medications.<sup>36</sup>,<sup>37</sup> High drug prices have resulted in one in four Americans not being able to afford their prescription drugs.<sup>38</sup>

In contrast, PSAOs manage administrative tasks for independent pharmacies and small chains. These entities provide independent pharmacies with the tools to improve patient outcomes. Further, PSAOs do not set a drug's list price, nor are they able to effectively negotiate them with the PBMs, as detailed above. They also do not receive manufacturer's rebates, payments from third-party payers or PBMs, or retain or dictate pharmacy reimbursement rates. Ultimately, PSAOs do not influence what patients pay at the pharmacy counter. Regulating PSAOs will not yield any insights into prescription drug costs and patient out-of-pocket costs.<sup>39</sup>

#### Misconception: PSAOs are an obligatory middleman between independent pharmacies and PBMs.

PSAOs offer optional services to assist independent pharmacies in managing PBM red tape. However, independent pharmacies that choose to hire a PSAO can also choose to have a direct relationship with a PBM and/or third-party payer. Many independent pharmacies or small chains often do not have the in-house expertise or time to carry out services PSAOs offer and, as such, find it more efficient to outsource the role to PSAOs.<sup>40</sup>

PSAOs operate as an extension of independent community pharmacies as a part of independent pharmacies' administrative functions to ensure PBMs follow the terms of the PSAO-PBM contract and state law. Independent pharmacies must contract with PBMs so they can have access to pharmacy networks and patients. The three largest PBMs cover 80 percent of patient prescription drug benefits.<sup>41</sup> This means that if a pharmacy is not under contract with a large PBM, it will not be able to serve most patients in their community. In contrast, an independent pharmacy may operate without a PSAO if they maintain in-house administrative support and expertise, which will not harm their ability to serve patients.

Simply put, pharmacies must contract with a PBM to maintain their business, whereas using a PSAO is entirely voluntary.

#### Misconception: PSAOs determine drug costs and patient out-of-pocket costs.

PSAOs do not influence prescription drugs or patient out-of-pocket costs. Drug manufacturers, PBMs, and health insurers set those prices.<sup>42</sup> PSAOs also do not have an economic incentive to influence drug or patient out-of-pocket costs because they do not receive manufacturers' rebates or payments from third-party payers and/or PBMs.

The role of PSAOs is to assist independent pharmacies with administrative tasks that allow them to focus on serving patients.

#### Misconception: PSAOs lack transparency.

As an extension of independent community pharmacy clients, PSAOs are paid a flat monthly fee by their pharmacy customers. In fact, PSAO services are reported not to be a profitable business model for PSAO owners.<sup>43</sup> PSAOs are simply a tool for independent pharmacies. In summary, PSAOs do not receive manufacturer's rebates, payments from third-party payers and/or PBMs, or retain or dictate pharmacy reimbursement rates.<sup>44</sup>

While the PSAOs support price transparency, their services are voluntary and based on a flat monthly fee. Therefore, any price transparency measures should consider their role and impact on drug pricing. They should not be overly burdensome on the PSAO industry to ensure they can continue operations and support independent pharmacies.

#### Misconception: PSAOs have increased market influence because of their relationships with distributors.

Some PSAOs are owned and operated by distributors, which opt to provide this additional service to independent and small chain pharmacies. Other PSAOs operate independently of distributors. When owned by a distributor, PSAOs function as separate legal entities and operate independently, meaning distribution and PSAO staff do not interact. The lack of staff interaction and the separation of PSAOs do not allow PSAOs to have an increased market influence.

#### Misconception: PSAOs assist pharmacies in purchasing prescription drug products.

While distributors own some PSAOs, the PSAO operations are separate from the distribution of prescription medications. A pharmacy may choose to utilize a PSAO, even if its distribution partner offers those services.<sup>45</sup>

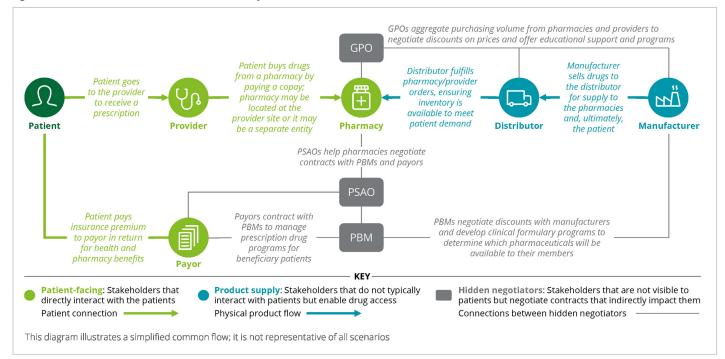
## CONCLUSION

PSAOs are business entities that run on slim margins with the overall goal of helping independent pharmacies serve patients. These entities are essential to maintaining independent pharmacies because of the administrative services they provide. The core PSAO services include contract evaluation, operational and transaction support, and analysis and forecasting. Those services benefit both the independent pharmacy and the third-party payer or PBM. PSAO services are essential to independent pharmacies and, ultimately, patients. As policymakers seek to understand the role of PSAOs further, they should consider the benefits PSAOs provide independent pharmacies, resulting in these small businesses being able to better serve patients.

## APPENDIX

#### Key Stakeholders in the Pharmaceutical Ecosystem

Figure 2. Pharmaceutical distribution ecosystem.



#### Source: HDA Role of Distributors in the U.S. Healthcare Industry

The pharmaceutical ecosystem exists to serve patients through access to safe prescription medications. The pharmaceutical supply and payment chains make up the pharmaceutical ecosystem. Short explanations of pharmaceutical stakeholders in the ecosystem are listed below.

#### Manufacturers

Brand drug manufacturers research, develop, produce, market, and sell prescription drugs to meet medical needs. Generic drug manufacturers have therapeutically equivalent products once a brand drug is off patent. Manufacturers produce, prepare, compound, convert, process, package, or label prescription drugs. Manufacturers sell prescription medications in bulk to distributors (pharmaceutical wholesalers), pharmacies, or healthcare facilities.<sup>46</sup>

#### **Pharmaceutical Distributors**

Distributors purchase prescription drugs from multiple manufacturers, take legal ownership of the product, manage inventory, assume credit risk, and then package and ship those products to dispensers as needed.

#### **Healthcare Providers**

Healthcare providers are individuals or facilities licensed to provide medical care to patients. This can include both diagnosis and treatment of medical conditions.

#### **Pharmacists**

A pharmacist is a healthcare provider trained and licensed in prescription drug dispensation, drug interactions, vaccine administration, and counseling patients about their medications and other medical needs.

#### **Pharmacies**

Pharmacies provide prescription drugs directly to patients and collect applicable co-pays or co-insurance.

#### Health Insurers

Health insurers help cover a patient's medical expenses (preventative services, medication, surgical interventions). Many prescription medications are paid for, in part, by health insurers. Patients may be responsible for a co-pay or meeting a deductible.

#### **Pharmacy Benefit Managers**

Pharmacy Benefit Managers (PBMs) manage prescription drug benefits, including determining costs and developing formularies (lists of covered medications) for health insurers and other payers. They also negotiate pricing with both drug manufacturers and pharmacies.<sup>47</sup>

#### **Pharmacy Service Administrative Organizations**

Pharmacy Service Administrative Organizations (PSAOs) contract with pharmacies for a flat monthly fee to provide administrative services, including assisting with the pharmacy's relationship with insurers and PBMs.

### REFERENCES

- <sup>1</sup> Sood, Neeraj, PhD, et. al. "The Flow of Money Through the Pharmaceutical Distribution System." USC Schaeffer. June 2017. <u>https://healthpolicy.usc.edu/wp-content/uploads/2017/06/The-Flow-of-Money-Through-the-Pharmaceutical-Distribution-System\_Final\_Spreadsheet.pdf</u>.
- <sup>2</sup> McKinsey & Company. "Meeting changing consumer needs: The U.S. retail pharmacy of the future." March 17, 2023.
- <sup>3</sup> Commonwealth Fund. Singh, Surya. Seeley, Elizabeth. "Competition, Consolidation, and Evolution in the Pharmacy Market." August 12, 2021. <u>https://www.commonwealthfund.org/publications/issue-briefs/2021/aug/competition-consolidation-evolution-pharmacy-market</u>.
- <sup>4</sup> Fein, Adam J., PhD. "The 2022-23 Economic Report on Pharmaceutical Wholesalers and Specialty Distributors." Drug Channels Institute. October 2022.
- <sup>5</sup> Healthcare Distribution Alliance. "Pharmacy Services Administrative Organizations: What You Need to Know." <u>https://www.hda.org/getmedia/76be7ce3-acd3-4250-8bcd-ad1c75f74dc0/PSAOs-What-You-Need-to-Know.pdf</u>.
- <sup>6</sup> National Community Pharmacists Association. "NCPA Digest." 2022.
- <sup>7</sup> UPMC "9 out of 10 Americans Live Close to Community Pharmacy." Accessed May 2, 2023. <u>https://www.upmc.com/</u> media/news/072722-community-pharmacy.
- <sup>8</sup> Tsuyuki RT, Beahm NP, Okada H, Al Hamarneh YN. "Pharmacists as accessible primary health care providers: Review of the evidence." Accessed May 2, 2023. <u>https://journals.sagepub.com/doi/10.1177/1715163517745517</u>.
- <sup>9</sup> Gallup. "Honest/Ethics in Professions." Accessed May 2, 2023. <u>https://news.gallup.com/poll/1654/honesty-ethics-professions.aspx</u>.
- <sup>10</sup> Fein, Adam J., PhD. "The 2022-23 Economic Report on Pharmaceutical Wholesalers and Specialty Distributors." Drug Channels Institute. October 2022.
- <sup>11</sup> Appold, Karen. "Independent Pharmacies: Not Dead Yet." Accessed May 2, 2023. <u>https://www.drugtopics.com/view/</u> independent-pharmacies-not-dead-yet.
- <sup>12</sup> The Business Journals. "How the small, neighborhood pharmacy prevails." *Drug Topics*. April 24, 2017. <u>https://www.bizjournals.com/triangle/news/2017/04/24/how-the-small-neighborhood-pharmacyprevails.html</u>.
- <sup>13</sup> Salako, Abiodun, MPH, Ullrich, Fred, BA, Mueller, Keith J., PhD "Update: Independently Owned Pharmacy Closures in Rural America, 2003-2018." Rural Policy Research Institute Center for Rural Health Policy Analysis. 2018. <u>https://rupri.public-health.uiowa.edu/publications/policybriefs/2018/2018/2018/20Pharmacy%20Closures.pdf</u>.
- <sup>14</sup> Ibid.
- <sup>15</sup> Fein, Adam J., PhD. "The 2023 Economic Report on U.S. Pharmacies and Pharmacy Benefit Managers." Drug Channels Institute. March 2023.

<sup>16</sup> Ibid.

<sup>17</sup> McKinsey & Company. "Meeting changing consumer needs: The U.S. retail pharmacy of the future."

<sup>18</sup> Ibid.

<sup>19</sup> Ibid.

<sup>20</sup> Stehr, Tom. "Independent Pharmacists Need Support from the Healthcare Supply Chain to Provide for New Jersey Communities." Tapinto. June 13, 2023. <u>https://www.tapinto.net/towns/bordentown/columns/independent-pharmacists-need-support-from-the-heal/articles/independent-pharmacists-need-support-from-the-healthcare-supplychain-to-provide-for-new-jersey-communities.</u> <sup>21</sup> Ibid.

<sup>22</sup> Healthcare Distribution Alliance. "Pharmacy Services Administrative Organizations: What You Need to Know."

<sup>23</sup> Avalere Health. "The Role of Pharmacy Services Administrative Organizations for Independent Retail and Small Chain Pharmacies." September 30, 2021. <u>https://hda.org/getmedia/9902c3e9-81ae-422c-b413-d982e995e9d4/The-Role-of-PSAOs-for-Independent-Retail-Small-Chain-Pharmacies.pdf</u>.

<sup>24</sup> Ibid.

<sup>25</sup> Ibid.

- <sup>26</sup> Fein, Adam J., PhD. "The 2023 Economic Report on U.S. Pharmacies and Pharmacy Benefit Managers." Drug Channels Institute. March 2023.
- <sup>27</sup> United States Government Accountability Office. Prescription Drugs. The Number, Role, and Ownership of Pharmacy Services Administrative Organizations. GAO 13-176 (Washington, DC, 2013). <u>https://www.gao.gov/assets/gao-13-176.</u> pdf.
- <sup>28</sup> Brannon, Ike. "Drug Price Legislation Inexplicably Exempts Important Market Forces." Forbes. June 14, 2023. <u>https://www.forbes.com/sites/ikebrannon/2023/06/14/drug-price-legislation-inexplicably-exempts-important-market-forces/?sh=707e93889d70</u>.

<sup>29</sup> Ibid.

<sup>30</sup> Healthcare Distribution Alliance. "Pharmacy Services Administrative Organizations: What You Need to Know."

- <sup>31</sup> "Maryland Insurance Administration Pharmacy Services Administrative Organizations Regulation," Maryland General Assembly, CH0399. 2020. <u>https://mgaleg.maryland.gov/mgawebsite/Legislation/Details/HB0978?ys=2020RS</u>.
- <sup>32</sup> Healthcare Distribution Alliance. "Governor Hogan's Signing of Maryland Law Affirms Critical Role of PSAOs and Support for Independent Pharmacies." May 12, 2022. <u>https://www.hda.org/newsroom/2022/governor-hogan-s-signing-of-maryland-law-affirms-critical-role-of-psaos-and-support-for-independent/</u>.
- <sup>33</sup> PhRMA. "New Report Finds Largest PBMs Restrict Access to More Than 1,150 Medicines." Accessed May 10, 2023. <u>https://phrma.org/resource-center/Topics/Access-to-Medicines/New-Report-Finds-Largest-PBMs-Restrict-Access-to-More-Than-1150-Medicines</u>.

<sup>34</sup> Ibid.

<sup>35</sup> Ibid.

- <sup>36</sup> The Commonwealth Fund. "Pharmacy Benefit Managers and Their Role in Drug Spending." Accessed May 3, 2023. <u>https://www.commonwealthfund.org/publications/explainer/2019/apr/pharmacy-benefit-managers-and-their-role-drug-spending</u>.
- <sup>37</sup> House Committee on Oversight and Reform Minority Staff. "A View from Congress: Role of Pharmacy Benefit Managers in Pharmaceutical Markets." December 10, 2021. <u>https://oversight.house.gov/wp-content/uploads/2021/12/</u> <u>PBM-Report-12102021.pdf</u>.
- <sup>38</sup> Kaiser Family Foundation. "Poll: Nearly 1 in 4 Americans Taking Prescription Drugs Say It's Difficult to Afford Their Medicines, including Larger Shares Among Those with Health Issues, with Low Incomes and Nearing Medicare Age." March 1, 2019. <u>https://www.kff.org/health-costs/press-release/poll-nearly-1-in-4-americans-taking-prescription-drugs-say-its-difficult-to-afford-medicines-including-larger-shares-with-low-incomes/#:~:text=News%20Release-,Poll%3A%20 Nearly%201%20in%204%20Americans%20Taking%20Prescription%20Drugs%20Say,Incomes%20and%20Nearing%20 Medicare%20Age.</u>

<sup>39</sup> Healthcare Distribution Alliance. "Pharmacy Services Administrative Organizations (PSAO) Myths vs. Facts."

- <sup>40</sup> Avalere Health. "The Role of Pharmacy Services Administrative Organizations for Independent Retail and Small Chain Pharmacies."
- <sup>41</sup> PhRMA. "New Report Finds Largest PBMs Restrict Access to More Than 1,150 Medicines."
- <sup>42</sup> Novack, Gary D. "What Determines How Much Your Patient Pays for Their Medication in the United States?" April 27, 2016. <u>https://pubmed.ncbi.nlm.nih.gov/27131775/</u>.
- <sup>43</sup> United States Government Accountability Office. "Prescription Drugs. The Number, Role, and Ownership of Pharmacy Services Administrative Organizations."
- <sup>44</sup> Healthcare Distribution Alliance. "Pharmacy Services Administrative Organizations (PSAO) Myths vs. Facts."
- <sup>45</sup> Fein, Adam J. PhD. "The 2022-23 Economic Report on Pharmaceutical Wholesalers and Specialty Distributors."
- <sup>46</sup> Law Insider. "Pharmaceutical manufacturer definition." Accessed May 3, 2023. <u>https://www.lawinsider.com/dictionary/</u> <u>pharmaceutical-manufacturer</u>.

<sup>47</sup> The Commonwealth Fund. "Pharmacy Benefit Managers and Their Role in Drug Spending."