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# THE ECONOMIC IMPACT OF RESTRICTING INTERCHANGE FEES IN IOWA: AN ANALYSIS OF IOWA'S HSB 324

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## ABOUT COMMON SENSE INSTITUTE

**Common Sense Institute** is a non-partisan research organization dedicated to the protection and promotion of Iowa's economy. CSI is at the forefront of important discussions concerning the future of free enterprise and aims to have an impact on the issues that matter most to Iowans. CSI's mission is to examine the fiscal impacts of policies, initiatives, and proposed laws so that Iowans are educated and informed on issues impacting their lives. CSI employs rigorous research techniques and dynamic modeling to evaluate the potential impact of these measures on the economy and individual opportunity.

## TEAMS & FELLOWS STATEMENT

CSI is committed to independent, in-depth research that examines the impacts of policies, initiatives, and proposed laws so that Iowans are educated and informed on issues impacting their lives. CSI's commitment to institutional independence is rooted in the individual independence of our researchers, economists, and fellows. At the core of CSI's mission is a belief in the power of the free enterprise system. Our work explores ideas that protect and promote jobs and the economy, and the CSI team and fellows take part in this pursuit with academic freedom. Our team's work is informed by data-driven research and evidence. The views and opinions of fellows do not reflect the institutional views of CSI. CSI operates independently of any political party and does not take positions.

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## INTRODUCTION

In a world where the use of cash is becoming increasingly rare, interchange fees serve a vital role by funding the security and infrastructure of payment card systems, which in turn facilitate trade in our modern economy. However, initiatives that restrict these fees—an instance of government price controls—are becoming more commonplace and have even been passed into law in states like Illinois.

Advocates of these laws argue they will save merchants and consumers money.<sup>1</sup> Focusing solely on the costs associated with card acceptance ignores the benefits that accrue to merchants, consumers, and the economy more broadly. More importantly, this narrow perspective omits the costs and technical burdens associated with modifying the existing global payment system to facilitate regulatory changes in one state of one country. State policies placing government-imposed price caps or restrictions on interchange fees could render the issuing and acceptance of debit and credit cards in that state infeasible, bringing about significant economic harm.

In 2025, Common Sense Institute published a report educating and informing the public about interchange fees, their role in the payment card system, and the impacts of payment cards on the economy.<sup>2</sup> Given the novelty of the many state-specific restrictions on interchange fees that have gained popularity in recent years, little information existed regarding the potential economic impacts of such legislation at the state level prior to publication of CSI's report. As of writing, Illinois's 2024 Interchange Fee Prohibition Act (IFPA) is the only state law restricting interchange fees or the application of interchange fees to the tax and gratuity portions of electronic payment transactions that has successfully passed in a state legislature. It has not yet been implemented. As such, CSI's previous report used the Colorado economy as a case study, detailing the economic impacts of implementing an IFPA-like restriction on interchange fees in the state using dynamic macroeconomic simulation. This report conducts similar macroeconomic modelling but uses Iowa's HSB 324 as the reference point for analysis.<sup>3</sup>

## KEY FINDINGS

- By prohibiting interchange fees from being charged on the tax portion of an electronic payment transaction, Iowa's HSB 324 would reduce a merchant's interchange fees by about \$0.004 on a \$100 sale transacted with a debit card. For a credit card, CSI estimates merchants would save roughly \$0.12 per \$100 in sales.
  - › HSB 324 would effectively reduce the total interchange fee from \$0.264 to \$0.260 on a \$100 debit transaction, reducing the fee by about 1.2%.
  - › If HSB 324 had been in effect in 2025, CSI estimates merchants would have saved \$36.2 million on interchange fees, or roughly 0.06% of total taxable sales in the state that year.
- HSB 324 would benefit a few large retailers the most. CSI estimates 8.5% of retailers would realize about 65% of the savings from the bill.
  - › The 42.3% of filers with less than \$100,000 in annual taxable sales would collectively receive only 2% of the savings. A merchant with \$100,000 in taxable sales would save an estimated \$64 annually.
- CSI analysis and calculations suggest it could cost Iowa merchants \$82 million to implement the system upgrades necessary to comply with HSB 324.
  - › For the 42% of Iowa merchants with \$100,000 or less in sales, it could take a decade or longer before the savings from HSB 324 would offset their implementation costs.
- Simulating the impacts of the direct costs and merchant savings from HSB 324 using macroeconomic modeling, CSI projects that in its first year of implementation, the bill would cost Iowa's economy about—
  - › \$67 million in economic output,
  - › \$42 million in GDP,
  - › \$26 million in personal income,
  - › 350 jobs,
  - › 200 residents, and
  - › 150 workforce participants.

- The economic output loss of \$67 million in the first year alone exceeds 185% of the \$36.2 million in annual interchange savings merchants would realize under the law.
- CSI's modeling generously assumes HSB 324 can be implemented as written and that the payment ecosystem adapts at the conservative costs modeled. The law, however, puts Iowa in uncharted territory. If implementation proves infeasible, card issuers and networks may withdraw card services in Iowa rather than absorb the costs of reengineering a global payment system in response to legal changes in a single state.
- In the worst-case scenario of card issuers withdrawing services from Iowa rather than conforming to the new law, assuming only a 5% contraction in card-based consumer spending, with the remaining 95% shifting to other payment methods, CSI projects Iowa would lose an estimated—
  - > \$3.2 billion in economic output,
  - > \$1.9 billion in GDP,
  - > \$1 billion in personal income,
  - > 18,200 jobs,
  - > 17,500 residents, and
  - > 4,200 workforce participants.

## THE CARD PAYMENT LANDSCAPE

Each time a consumer uses a credit or debit card for a transaction, the merchant's bank (the acquirer) charges interchange fees to the cardholder's bank (the issuer). These fees are based on the type of card used and the payment method for which the card was used—whether in person, online, or manually keyed in. The acquiring bank generally pays these fees, passing the cost along to merchants. Interchange fees are usually calculated as a percentage of the transaction amount, including taxes and any gratuity, but often also include a small, fixed amount per transaction. Interchange fees have averaged an estimated 0.73% for debit transactions and 1.80% for credit transactions in recent years.<sup>4</sup>

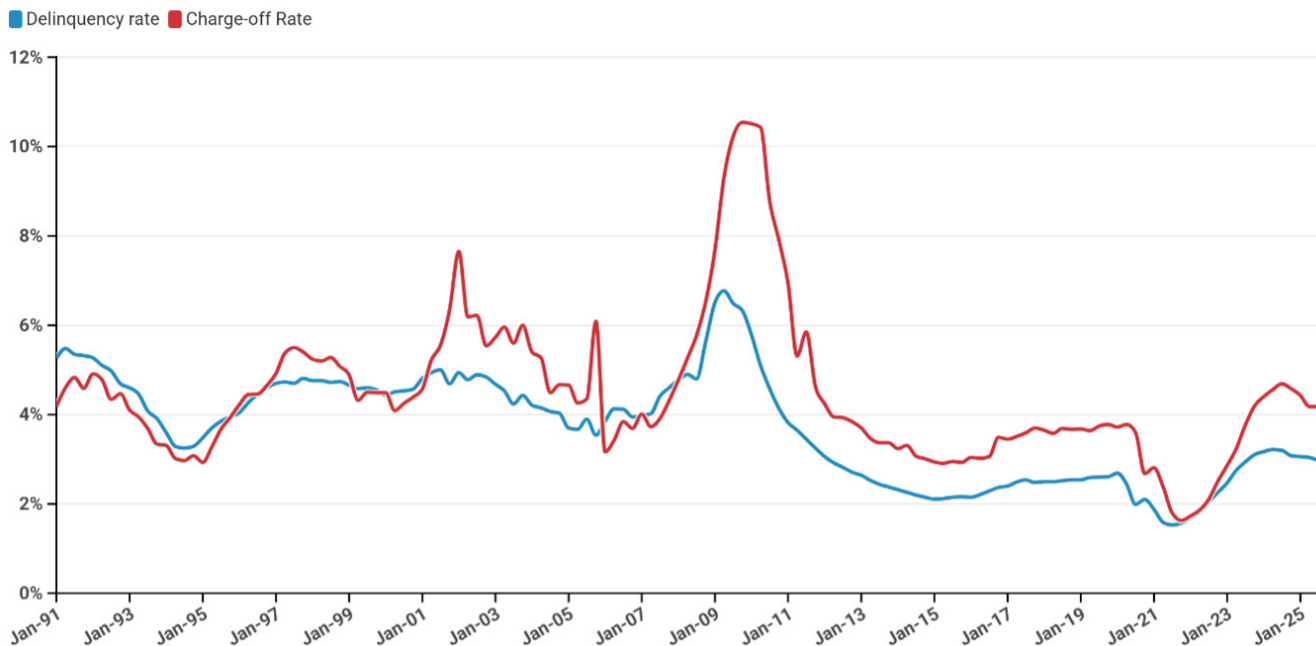
Issuing banks use revenue from interchange fees to fund various services such as fraud prevention. Fraud losses are expected to exceed \$165 billion over the next 10 years.<sup>5</sup> Financial fraud imposes real costs on Iowans specifically. Common Sense Institute projects that reported and unreported fraud losses in Iowa alone totaled as much as \$666 million in 2025, reducing state GDP by up to \$1.5 billion and costing the state's General Fund an estimated \$46 million in tax revenue.<sup>6</sup>

Beyond the losses themselves, financial institutions expend countless resources preventing fraud in the first place and investigating it when it does occur. In 2025, LexisNexis reported in its eighth annual "True Cost of Fraud Study" that for each \$1 lost to fraud, financial institutions in the United States and Canada lose \$5.75.<sup>7</sup> Interchange fees therefore serve as compensation for issuing banks for assuming the risks associated with debit and credit card transactions.

These risks include a cardholder maintaining insufficient funds in their account to pay for a transaction or issuers writing off outstanding balances they can no longer recover, also called bad debt. In the case of debit cards, transactions can sometimes pass the clearing process despite the cardholder having insufficient funds later during settlement. With credit cards, cardholders use issuer funds to make purchases with the promise to repay in the future. Cardholders often fail to pay back those liabilities on time and may default on repayment entirely. For instance, the New York Federal Reserve notes that as of the fourth quarter of 2025, 2.94% of all credit card debt was delinquent while banks wrote off another 4.11% as uncollectible.<sup>8</sup> In both cases card issuers assume the risk associated with the transaction. Figure 1 visualizes credit card delinquency and charge-off rates since 1991.

FIGURE 1.

## Credit Card Delinquency and Charge-Off Rates for All Commercial Banks



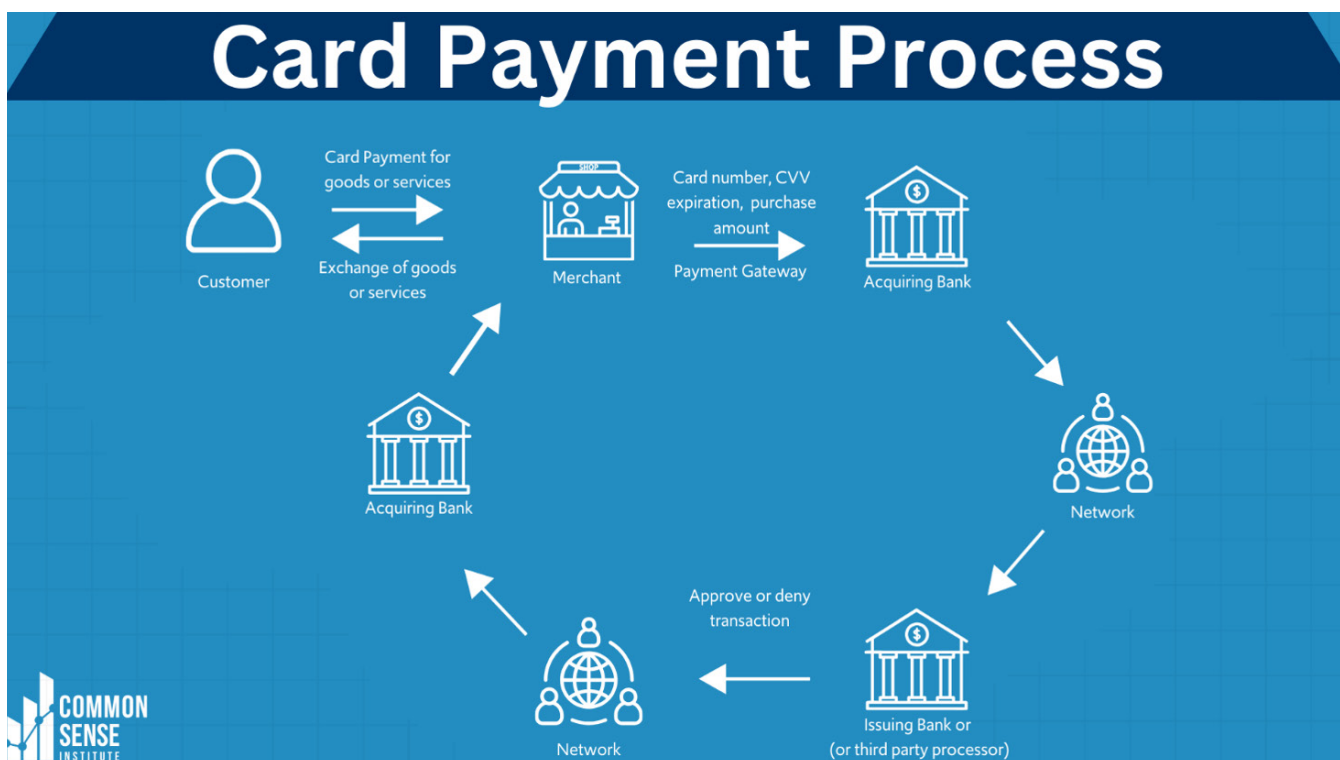
Contrary to the common understanding, networks like Visa and Mastercard do not receive revenues from interchange fees.<sup>9</sup> Payment networks set the level of interchange fees. Acquiring banks then pay the fee and pass down the costs to their merchant customers.<sup>10</sup> In setting interchange fees, networks must balance the interests of card issuers and acquiring banks. If networks set fees too high, acquiring banks—and their merchant customers—will not accept that network’s cards as a form of payment. If networks set rates too low, issuing banks will not issue a network’s card.

## How Card Payments Work

When a consumer uses a debit or credit card to make a purchase, the merchant’s payment gateway or payment processor—often in the form of a point-of-sale (POS) device—collects essential information such as the debit or credit card number, expiration date, Card Verification Value (CVV), and the transaction amount. Figure 2 illustrates the card payment process, showing the circular flow of information and funds among the customer, merchant, payment gateway, acquiring bank, network, and issuing bank. Business-to-consumer transactions utilize level 1 data, which transmits limited information about the transaction. Notably, it does not transmit tax data.

Card and purchase information is then securely transmitted in encrypted form to the merchant’s bank, or in many cases, a third-party payment processor. The acquiring bank or processor forwards the transaction details to the relevant card network (e.g., Visa, Mastercard), which in turn sends the request to the issuing bank or their third-party processor. Upon receiving the request, the issuing bank verifies the card details, checks the availability of funds, ensures the card’s validity, and performs fraud prevention checks. After reviewing these elements, the issuing bank either approves or denies the transaction. The payment gateway or processor then promptly notifies the merchant of the decision, allowing the transaction to proceed, all of which happens within milliseconds.

FIGURE 2.



## Who Pays What?

The payment card system is designed to securely handle sensitive information, facilitate data exchange between parties, and reduce the risk of fraud. To support this system, fees are applied whenever a credit or debit card is used in a transaction. The fees fund the various entities and components that make the system function. Fees typically include gateway fees, acquirer fees, network fees, and interchange fees.

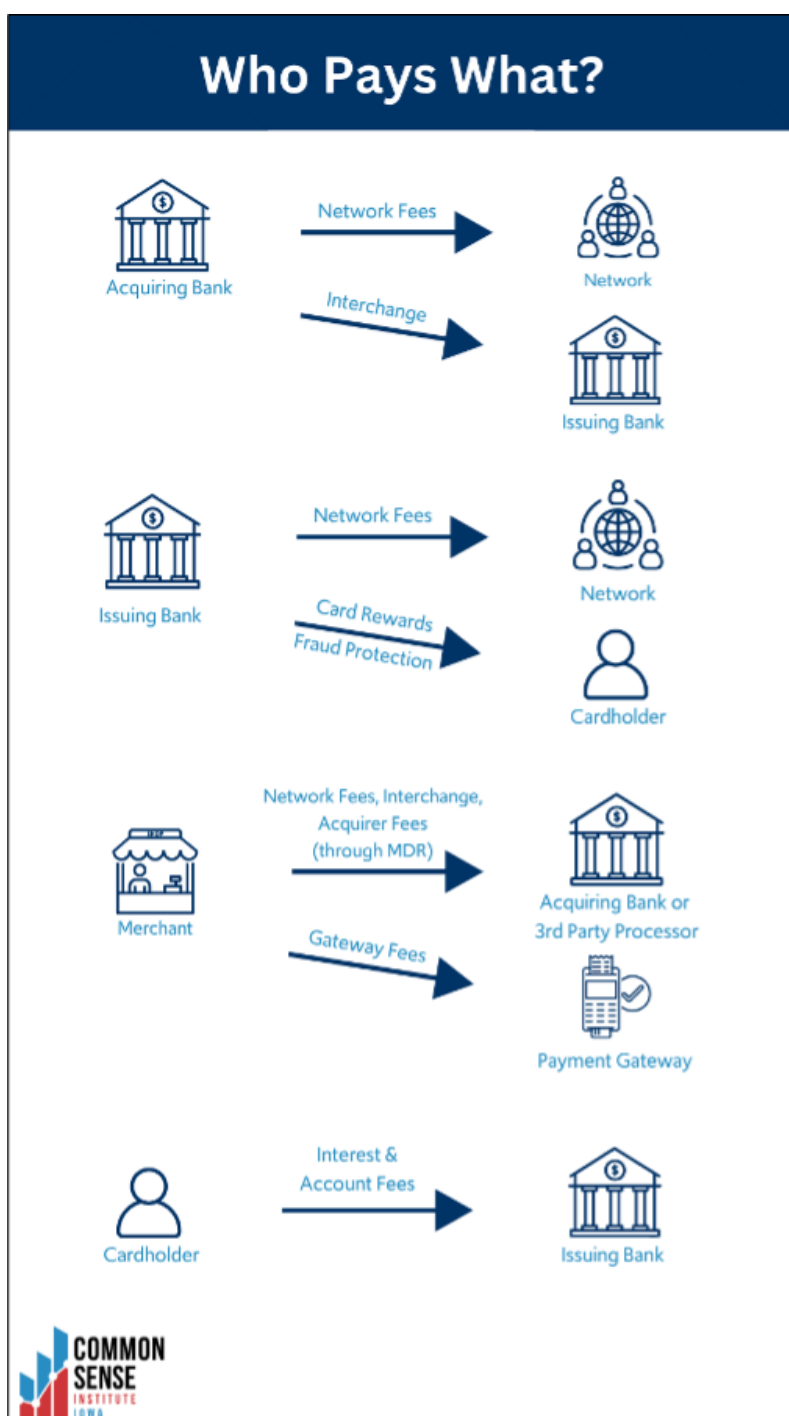
**Card Acquirer:** The card acquirer—or merchant’s bank—is responsible for the payment of network and interchange fees. However, these costs are typically transferred to the merchant in the form of a Merchant Service Charge (MSC) or Merchant Discount Rate (MDR), which is often subject to negotiation between the acquirer and the merchant. In addition to network and interchange fees, acquirers may also charge merchants additional acquirer fees for their services.

**Merchant:** Merchants bear the cost of the MSC or MDR, which covers both the network and interchange fees and the acquirer fees. Merchants are also liable for gateway fees or merchant service provider (MSP) fees. Notably, merchants may add a surcharge to purchases made using a credit card to pass the cost on to the consumer directly, but they often choose not to do so.<sup>11</sup>

**Card Issuer:** Card issuers, typically banks or other financial institutions, are responsible for paying network fees and providing rewards or cashback incentives to cardholders. In return, card issuers receive interchange fees from merchants and may also collect fees from cardholders, including annual fees and late payment charges. Many issuers also pay a third party to process their card payments.

**Cardholder:** Cardholders are responsible for interest and other account fees associated with their debit or credit card.

FIGURE 3.



# THE ECONOMICS OF CARD PAYMENTS

The payment card industry serves as a prime example of a two-sided market. These markets are characterized by interactions between two distinct groups of agents facilitated by a third-party intermediary, where the decisions or participation of one group influences the participation of the other.<sup>12</sup> In the case of the payment card industry, consumers and merchants represent the two agents, while payment card networks act as the intermediaries. For payment cards to succeed, consumers must be willing to use them, and merchants must be willing to accept them. In other words, the participation of either party in the market directly impacts the participation of the other party, as customers cannot use a card that no merchant is willing to accept, and vice versa.

This arrangement can lead to outcomes much different than those experienced in more traditional, one-sided markets. In particular, two-sided markets often lead to one side subsidizing the other, especially if one side happens to be more price sensitive.<sup>13</sup> In this instance, merchants and acquiring banks subsidize card usage by consumers, but this consumer benefit is not unique to the payment card industry. Social media platforms are free for users, but the revenue that supports these platforms comes from advertisers.<sup>14</sup> In this instance, advertisers subsidize the users of social media.

## Rising Merchant Costs

Much of the attention to the fees associated with the card payment system has been focused on those borne by merchants. According to a 2024 CMSPI report, merchants in the United States paid over \$224 billion in total fees in 2023, with \$143 billion alone going to interchange.<sup>15</sup> About 74% of total interchange fee revenue comes from credit cards versus about 26% for debit cards.<sup>16</sup>

While interchange and other card acceptance fees as a share of overall expenses for merchants have increased over the years, this jump is primarily due to the increasing popularity of debit and credit cards—which now combine for two-thirds of all purchases in the United States—relative to other methods like cash and check.<sup>17</sup> In the five years between 2016 and 2021, total U.S. interchange revenue from debit cards grew 61.3%, or about 10.0% per year.<sup>18</sup> However, the total value of debit transactions grew even more, at 73.6%, or about 11.7% per year.

Information regarding aggregate credit card transactions is less abundant, but data from Javelin Strategy and Verisk and cited by the Electronic Payments Coalition (EPC) shows that credit card interchange rates have remained largely flat since 2014, while the average MDR faced by retailers has only increased

marginally. These facts reinforce the notion that costs have increased mostly due to the rising popularity of card payments rather than rising fee rates.

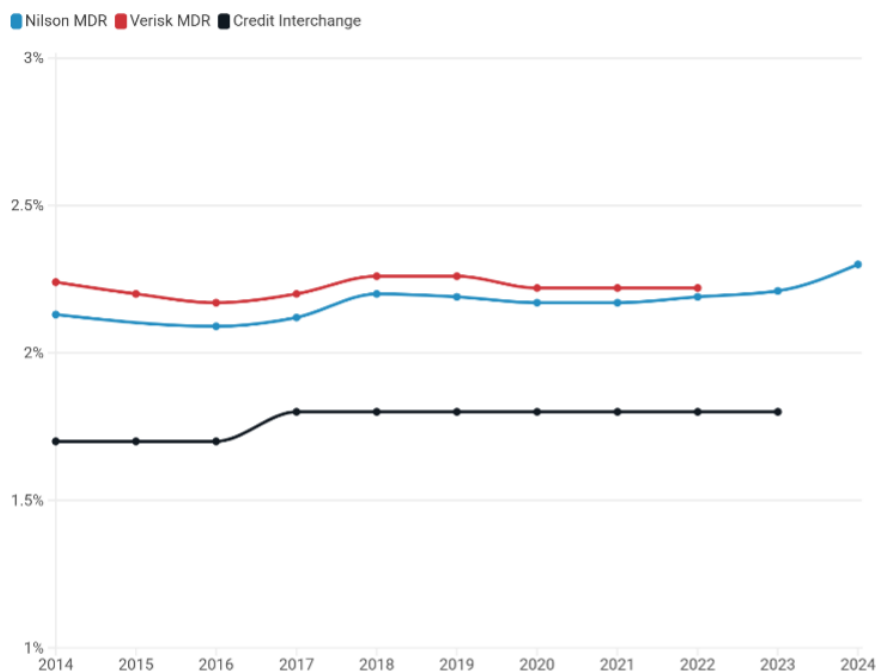
## Benefits to Merchants and Consumers

Evaluating card payments solely based on the explicit fees that merchants pay to accept them vastly overstates the true costs. First, merchant activities necessitate the acceptance of at least some form of payment, and other payment methods—such as cash or check—themselves are not costless. Thus, any true evaluation of the costs of card acceptance should at least be weighed against the costs of alternative methods. Second, even though merchants subsidize the use of debit and credit cards through interchange fees, they likely benefit significantly from their use. Payment cards are extremely convenient for consumers, and the various rewards and cash-back programs associated with many credit and debit cards often induce customers to spend more than they otherwise would—benefiting the establishments that make those sales.

**FIGURE 4.**

### Weighted Average Merchant Discount Rate (MDR) and Interchange Rate for U.S. Credit Cards.

Although merchants and some interest groups point to rising MDR and interchange fees, this is due to the rising popularity of electronic payments over the last several years, not the growth in the MDR rate paid by merchants.

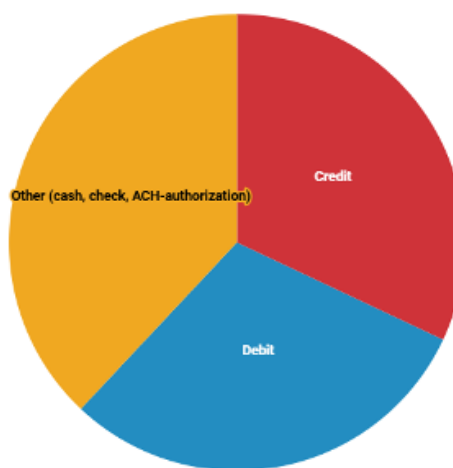


Source: Nilson Report, Electronic Payments Coalition

**FIGURE 5.**

### Debit and Credit Cards Combine for Two-Thirds of All Payments

As of 2023 debit cards account for 30% of all transactions while credit cards account for another 32%.



Source: Federal Reserve Bank of Atlanta

The costs of cash can be substantial. One study concluded that cash-handling costs ranged from 4.7% to over 15% of the value of the cash transaction.<sup>19</sup> However, businesses often fail to internalize these costs since the activities associated with cash acceptance fall under the responsibilities of store managers and other already existing staff, whereas the acceptance of payment cards requires explicit fees and the purchase of POS hardware. In one especially glaring example of how cash acceptance can drive higher expenses, Death Valley National Park in California transitioned to exclusively cashless payments after spending over \$40,000 to process the \$22,000 in cash it collected one year.<sup>20</sup>

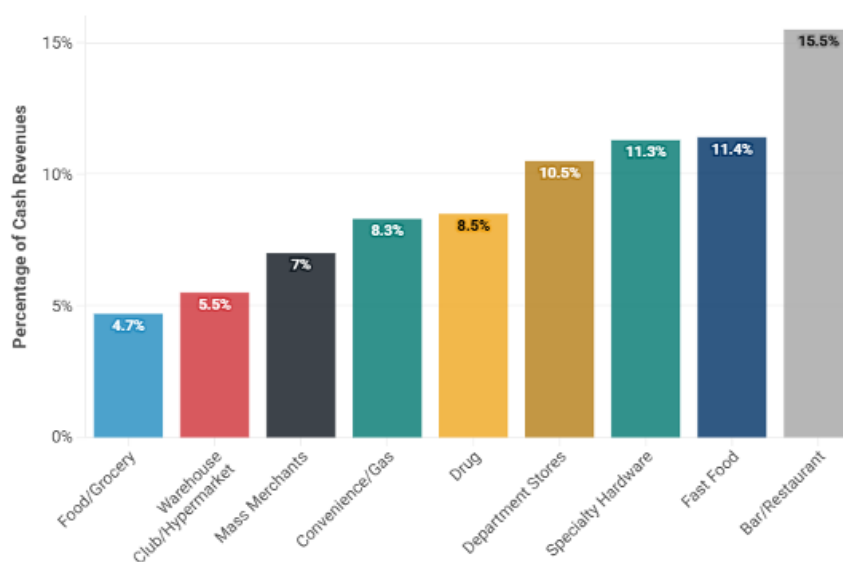
Further research that compares the costs of card payments to cash concludes that once the benefits of card payments are fully accounted for, debit and credit cards are most often cheaper.<sup>21</sup> This outcome occurs because cards are convenient for consumers; they reduce checkout times, thus increasing customer throughput<sup>22</sup>, and they remove the constraint that customers must have enough cash on their person at the time of sale, which contributes to higher transaction amounts (a phenomenon referred to as “ticket lift”). Credit and debit cards often provide consumers with incentives like cash back programs and airline miles as well, which can induce consumers to spend beyond what they would have otherwise spent using cash.

One such study from 2011 found that although the total costs including labor, hardware, and other direct and indirect costs for signature and PIN debit cards used at supermarkets were roughly double the costs for cash acceptance, the increased ticket lift and throughput improvements led to a total net benefit for signature debit cards of \$1.025 per transaction, compared to the net costs of cash of \$(0.489).<sup>23</sup>

Another study evaluating the effect of cash-back programs on consumer spending showed how consumers rationally increase their spending when using a cash-back credit card in lieu of cash.<sup>24</sup> Because cash-back rewards effectively lower the purchase price in a given transaction, price-sensitive consumers will end up spending more than if they had made the purchase in cash, even after accounting for the cash-back rewards. For example, a consumer with a price elasticity of demand of 1.5 receiving 2% cash back from credit card purchases would be induced to spend an additional \$0.46 for each dollar in cash-back rewards received. To illustrate this calculation in real-world outcomes, the \$67.9 billion in rewards offered by issuers in 2022 likely raised consumer spending by \$33.3 billion.

**FIGURE 6.**

### Cost of Cash by Market Segment



Source: IHL Group

# THE REGULATORY ENVIRONMENT AND FALLOUT FROM THE DURBIN AMENDMENT

Debit card interchange fees have been regulated by the Federal Reserve since 2011 under Regulation II, also known as the “Durbin Amendment” to the Dodd-Frank Wall Street Reform and Consumer Protection Act of 2010. Meanwhile, interchange fees on credit cards remain unregulated in the United States. The Durbin Amendment caps interchange fees on debit cards from issuers with over \$10 billion in assets at 21 cents per transaction plus 0.05% of the transaction amount, and an additional 1 cent fraud-prevention adjustment.

While the Durbin Amendment lowered the average interchange fee paid by merchants from an average of 51 cents per transaction for covered issuers (those issuers subject to the law) to 24 cents by 2021, the legislation led to several unintended consequences.<sup>25</sup> In response to lost interchange revenues from debit card programs, in 2011 50% of card issuers subject to the amendment ended their rewards programs—such as free checking, zero liability protection, and cash-back debit cards—contributing to an increase in the unbanked population in the United States by 1 million people from primarily low-income families.<sup>26</sup> Researchers at the University of Chicago also concluded that after taking into account the lost perks and increased fees levied by issuers, consumers lost upwards of \$25 billion.<sup>27</sup>

Interestingly, the reduction in costs for merchants as a result of the Durbin Amendment did not translate into savings for consumers through lower prices—a fact in direct conflict with the claims from proponents of interchange fee caps. According to the Federal Reserve Bank of Richmond, after the implementation of the Durbin Amendment, over 77% of merchants surveyed did not change prices, and another roughly 22% actually raised prices.<sup>28</sup>

## IOWA HSB 324

According to the Electronic Transactions Association, at least 70 bills since 2006 concerning credit and debit interchange fees have been introduced across state legislatures.<sup>29</sup> These efforts were especially concentrated in the years following the pandemic. In 2024, Illinois became the first state to introduce and pass legislation prohibiting interchange fees from being charged on the tax and gratuity portions of an electronic payment transaction.<sup>30</sup> Set to take effect in July 2026, Illinois's IFPA exempts merchants from paying debit and credit interchange fees on the sales tax and gratuity portion of any transaction and levies a \$1,000 per-transaction civil penalty on banks or other parties who collect interchange fees on taxes and tips in violation of the law.<sup>31</sup> The Iowa General Assembly considered similar legislation this year.

Iowa House Study Bill 324 (HSB 324), introduced in the 2025-26 General Assembly, prohibits issuers, payment card networks, acquirer banks, and processors from receiving or charging interchange fees on the taxable portion of electronic payment transactions.<sup>32</sup> Unlike Illinois's law, which covers both taxes and gratuities, Iowa's HSB 324 applies only to taxes, including sales and use taxes, hotel and motel taxes, local option taxes, automobile rental taxes, equipment taxes, water service taxes, fuel excise taxes, and cigarette and tobacco taxes. The bill imposes a \$1,000 per-violation civil penalty on payment card networks that fail to comply.

House Study Bill 324 or similar legislation would present significant implementation challenges for all parties in the payment ecosystem. While it would effectively lower interchange fees paid by merchants, implementation would likely require substantial system upgrades. Experience from the Europay, Mastercard, and Visa (EMV) rollout—commonly known as “chip” card implementation—illustrates the likely cost magnitude. The EMV upgrades in the United States carried an estimated total price tag of \$8.6 billion, with some sources citing costs as high as \$25 billion.<sup>33</sup>

### Implementing HSB 324

According to the language in HSB 324, the law could be implemented in one of two ways. First, merchants, payment processors, banks, and card networks could upgrade their systems to transmit tax data at the point of authorization and settlement, enabling interchange fees to be excluded from the tax portion in real time. Alternatively, merchants and banks could develop a system to capture and track tax information for each transaction and submit it later to obtain a rebate on the interchange fees applied to that tax amount.

## PAYMENT ECOSYSTEM MODIFICATIONS

Under a framework where all industry participants are required to transmit tax data at the point of sale and exclude the tax from interchange in real time, implementation would likely require significant system-wide upgrades. Merchants operating in Iowa would need to modify their point-of-sale software—and in some cases hardware—to identify and transmit tax amounts separately within each transaction. Payment processors and card networks would need to update routing logic, message formats, and settlement systems to carry and recognize this additional data field while ensuring consistency across authorization and settlement. Issuing and acquiring banks would also need to adjust their back-end systems to properly calculate and reconcile interchange based only on the non-tax portion of each transaction.

These changes introduce additional operational complexity that would likely require expanded staffing for reconciliation, exception handling, and fraud monitoring. As transaction data becomes more granular and system dependencies increase, the potential for mismatches between authorization and settlement records also rises, particularly if taxable amounts are calculated, transmitted, or interpreted inconsistently across systems. Any discrepancies could lead to errors in interchange calculations, requiring additional review, dispute resolution, and system oversight. The changes may also require additional resources dedicated to identifying and addressing potential manipulation or misreporting of taxable amounts within transactions.

## INTERCHANGE REBATES

The second implementation path would have merchants submit transaction-level tax information after the transaction to obtain rebates on interchange already paid. Choosing this approach over real-time tax flagging would be just as costly for merchants and financial institutions. Both would require building new tracking, reporting, and verification systems. Merchants would need to modify their point-of-sale and back-office systems to bifurcate taxable amounts for every transaction and retain detailed records tied to each individual card payment. Merchants simply submitting aggregate tax totals would not suffice because interchange varies by card type, transaction method, and other attributes. For banks to determine the applicable interchange amount accurately, merchants would need to provide transaction-level data that includes sufficient card and processing details. This represents a costly departure from current practices, placing an outsized burden on smaller merchants with relatively simple back-office systems.

This approach also raises operational and security concerns. Handling and transmitting more granular transaction and card-related data increases exposure to data security risks, particularly given that only 14.3% of merchants are fully compliant with Payment Card Industry (PCI) Data Security Standard requirements as of 2024.<sup>34</sup> Expanding the volume and sensitivity of stored and transmitted data could heighten vulnerability to breaches or misuse while also increasing compliance costs. In 2025, the average cost of a data breach in the United States reached a record \$10.22 million, and high-profile retail breaches have been even more costly.<sup>35</sup> Home Depot's 2014 data breach, for example, impacted over 50 million customers across 2,200 stores. The breach cost the company at least \$179 million in settlements with consumers, banks, and card networks.<sup>36</sup> Expanding the volume and sensitivity of stored and transmitted data could heighten vulnerability to breaches or misuse while increasing compliance costs. Banks would also need to develop systems to receive, validate, and audit large volumes of merchant-submitted transaction data, introducing additional administrative layers and the need for ongoing oversight.

The reconciliation process itself presents further complications. Differences between authorization and settlement—such as adjusted totals due to tips, partial captures, or cancellations—could make it difficult for banks to match merchant-submitted records to finalized transactions. These discrepancies increase the likelihood of errors or rejected rebate claims, requiring manual review and dispute resolution. Acquiring banks would face parallel challenges in managing interchange flows. They may need to temporarily hold an arbitrary amount of the interchange fees paid to card issuing banks pending reconciliation, which can create liquidity and opportunity costs, or submit refund requests across a wide network of issuing banks on behalf of merchants. Both approaches introduce additional coordination challenges, administrative burden, and system complexity across the payments ecosystem.

## DIRECT ECONOMIC IMPACTS

As made clear in this section and the section of this report entitled “The Economics of Card Payments,” implementing a cap or prohibition on interchange fees charged on the tax portion of electronic payment transactions would prove complicated and challenging, if not impossible. But implementation would not just be challenging; it would also be costly. Table 1 summarizes CSI’s estimates of the possible direct impacts of the legislation. The subsections that follow describe the derivation and underlying assumptions for those estimates. The direct impacts presented in table 1 serve as the model inputs for the macroeconomic simulation conducted for the next section of this report, “Macroeconomic Impacts.”

**TABLE 1.**

### Direct Impact of HSB 324

Impact Description	Impact in year one (mlns)	Impact over four years (mlns)	REMI Policy Variable
<b>Direct Merchant Impacts</b>			
	(REMI Input)		
Interchange Fee Savings to Merchants	-\$36.19	-\$151.39	Production Costs
Implementation Costs	\$41.29	\$82.58	Production Costs
Increased Processing Costs	\$3.29	\$13.78	Production Costs
<b>Direct Banking Impacts</b>			
Implementation Costs	\$9.12	\$18.24	Production Costs
Lost interchange fee revenue (passed through to consumers via higher prices)	0.02%	0.02%	Consumer Prices

### Merchants Savings

Using data from the Iowa Department of Revenue, CSI estimates that businesses in the state made over \$57.4 billion in taxable state and local sales in 2025 and collected roughly \$4.2 billion in sales taxes, including fuel excise and cigarette and tobacco tax.<sup>37</sup> Given average credit and debit interchange fees as a percent of sales, these sales generated roughly \$36.2 million in interchange fees paid on the tax portion of sales by merchants in Iowa—or roughly 0.06% of total taxable sales in the state that year.<sup>38</sup> However, simple calculations like this overestimate the actual savings that would accrue to businesses under HSB 324.

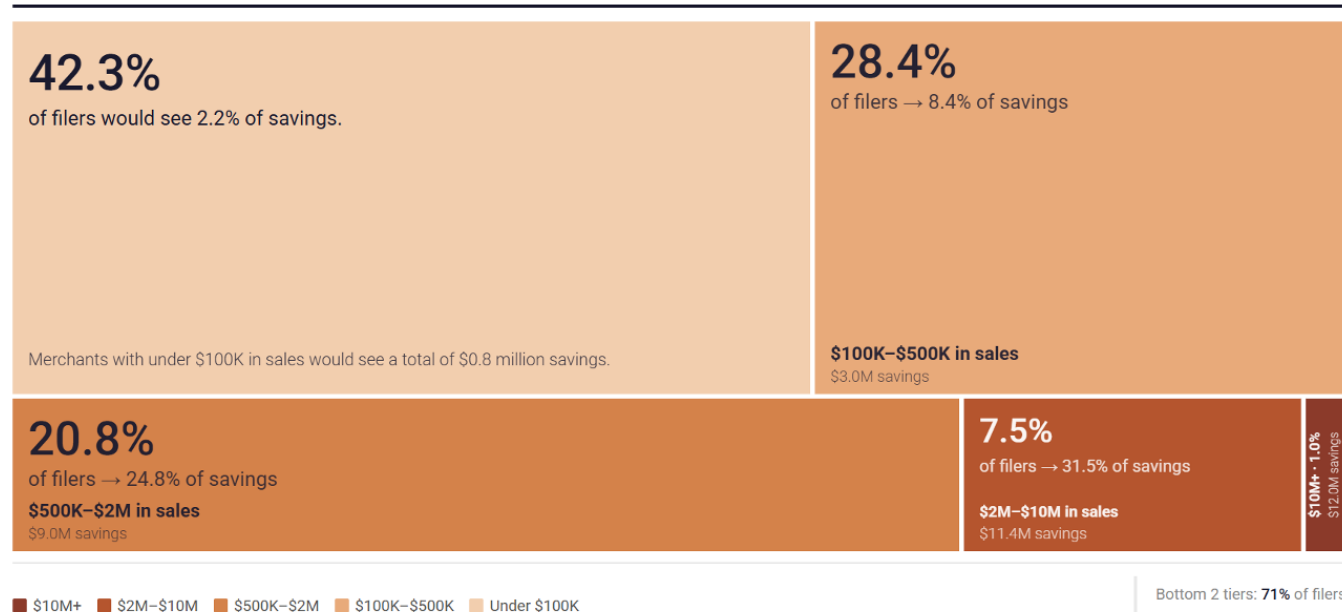
Illustrated in table 1, interchange fee schedules often include a fixed, per-transaction fee—typically a few cents per transaction—in addition to a percentage of the total transaction amount. By prohibiting the charging of interchange fees on the tax portion of a transaction, the merchant would only save the variable percent portion of the interchange charge. For example, interchange on debit cards is limited to \$0.21 plus 0.05% of the transaction value. In a situation where a merchant makes a \$106 sale (\$100 sale price plus 6% sales tax) the merchant would pay a total of \$0.264 in interchange fees. After HSB 324 they would owe \$0.260. These 1.2% savings in their overall interchange fees are a much smaller percentage than the 6% sales tax, which is savings that would be expected if interchange were a flat rate. Given that the fixed portion of an interchange charge can be a much larger portion of the overall interchange fees faced by a merchant—especially smaller merchants who sell goods and services in smaller average ticket amounts—the savings from bills like HSB 324 can be overstated.

Using the very generous estimate of \$36.2 million in savings, spread across the 165,156 businesses in the state that collect and remit sales taxes, HSB 324 would save each an average of roughly \$220 annually.<sup>39</sup> However, even this figure overestimates the savings for the vast majority of businesses in the state, since taxable sales are often dominated by a handful of large retailers. For example, in 2023 the top 10 retailers in the nation accounted for 38% of all taxable sales.<sup>40</sup> This fact suggests that a significant portion of the savings will accrue to a handful of large retailers in the state. A retailer would have to make at least \$344,000 in taxable sales to save the \$220 in interchange fees per year. A merchant with \$100,000 in taxable sales would save an estimated \$64 annually.

FIGURE 7.

**Projected Annual Merchant Savings from Interchange Exemption, by Retailer Size**

Share of Iowa sales-tax filers by annual taxable sales tier · Area proportional to filer count



Source: Iowa Dept. of Revenue, Retail Sales and Use Taxes Annual Report FY 2025 (Table 5), Feb. 2026. Savings shares allocated proportionally to taxable sales against \$36.2M total statewide savings estimate using the regulated debit interchange rate (\$0.21 + 0.05% of transaction value).

Indeed, the distribution of taxable sales across Iowa retailers makes this concentration observation concrete.<sup>41</sup> Figure 7 shows how the projected \$36.2 million in annual merchant savings would be distributed across retailers by annual taxable sales tier. The top two tiers—retailers with more than \$2 million in annual taxable sales—represent just 8.5% of Iowa sales tax filers but would capture roughly 65% of the savings, or about \$23.4 million. Meanwhile, the 42.3% of filers with less than \$100,000 in annual taxable sales would collectively receive only 2% of the savings. In other words, the benefits of HSB 324 would flow disproportionately to the largest retailers operating in Iowa, while the small businesses that make up the majority of the state’s sales tax filers would see negligible per-location savings.

## Lost Revenue to Card Issuers

The central input for the simulation is the interchange fees that would no longer be paid by merchants in Iowa, and the subsequent loss of interchange fee revenue by financial institutions operating in the state. Outlined in the previous subsection, CSI estimates merchants in Iowa paid over \$36.2 million in interchange fees on the sales tax portions of all debit and credit transactions made in the state, or roughly 0.07% of all taxable sales revenue made in 2025.<sup>42</sup> This amount represents the total savings to merchants in the state whose sales are accompanied by sales taxes. However, the reduction in fees for merchants would be met by an equal reduction in revenues for card issuing institutions.

Because these institutions operate on a national basis, the costs of this restriction would likely be spread around to institutions—and ultimately cardholders as seen in the fallout from the Durbin Amendment—both inside and outside of Iowa.\*

Although the costs might not be felt directly in the state, that does not mean that the costs do not exist. Therefore, to quantify the actual costs of HSB 324, CSI models the reduction in interchange fee revenues as a direct input to the Iowa economy. Specifically, this analysis captures the effect through adjustments to prices Iowa consumers face (+0.02%), since cardholders may absorb the shifted cost through higher card fees or reduced rewards rather than through higher transaction costs at the point of sale.

## Merchant Implementation Costs

As discussed earlier in this report, any implementation of an HSB 324-style prohibition on interchange fees will carry significant costs for banks, payment processors, and merchants. According to the Iowa Department of Revenue, Iowa’s businesses with sales tax permits number over 165,000.<sup>43</sup> While the true costs of implementation are unknown, CSI assumes a \$500 per-location cost to upgrade any merchant hardware, including POS terminals, and make any necessary adjustments to back-end payment and tax collection systems.

While this figure represents an assumption on the part of CSI to allow for more in-depth modeling, it has precedent. Sources suggest a standard POS terminal can cost between \$200 to \$2,000 per unit, with integrated credit card readers adding another \$100 to \$400.<sup>44</sup> Merchants operating multiple checkout lanes, or those requiring handheld devices for tableside or floor service, can face per-location

\* See the section of this report entitled “The Regulatory Environment and Fallout from the Durbin Amendment.”

hardware costs at or above the upper end of that range before accounting for software subscriptions and integration. Given these assumptions, the costs to merchants operating in Iowa just for systems upgrades reach \$82.6 million in total, assuming a conservative \$500 cost to the over 165,000 businesses in Iowa with a sales tax permit. To be even more conservative, the analysis treats these costs as one-time costs, spread over a four-year period, with half of the costs applied in year one. That means for the 42% of Iowa merchants with \$100,000 or less in sales, it could take a decade or longer before the savings from HSB 324 would offset their implementation costs.

Absent any definitive pathway to implement HSB 324, this cost estimate is highly speculative but demonstrates the potential magnitude of additional costs that significant changes to payment systems can impose on their users. By way of example, the Dodd-Frank Wall Street Reform and Consumer Protection Act of 2010 required implementation of EMV (“chip”) cards. Outside academic research put the total costs of implementing those changes as high as \$25 billion.<sup>45</sup> Apportioning these costs to Iowa based on relative GDP yields approximately \$217 million in total costs for Iowa merchants due to the EMV transition, or about \$43 million per year over five years.<sup>46</sup> Additionally, CSI’s estimates assume no ongoing administrative costs for merchants, such as through increased labor expenses to manage their more complex systems or the millions of lines of data that would need to be submitted to banks for interchange rebates. It also does not consider any subscription costs for enhanced security measures and other necessary features.

## Banking and Payment Sector Costs

As discussed previously, any path to implementing a law like HSB 324 would also impose costs on the financial institutions and payment service providers that operate within the card payment system. While actual costs are unknown, research points to previous changes in the card payment landscape. For example, *Business Insider* previously estimated that the rollout of chip cards in the United States eventually would cost about \$11 billion, with \$4 billion associated with non-hardware costs.<sup>47</sup> Assuming systemwide change to facilitate HSB 324 on a national scale would cost half of this amount, the total costs apportioned to the state of Iowa based on its share of GDP would be \$18.2 million, which we assume would be spread across a four-year implementation period. Half of these costs are assumed to be applied in year one.

## Increased Network and Other Fees

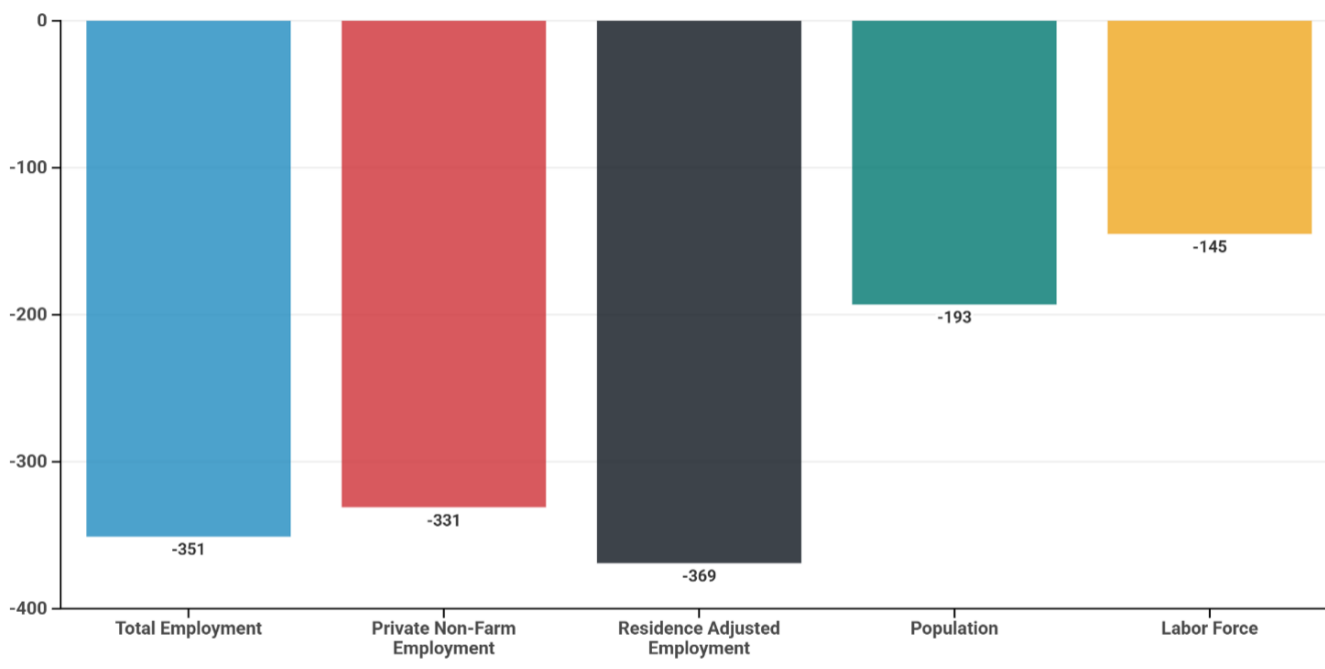
Finally, this report also models an increase in network and other processing fees paid by merchants to accommodate the complex changes needed to facilitate HSB 324 in the state of Iowa. This report assumes a 0.005-percentage-point increase to the network and other processing fees, which would cost merchants an estimated \$3.29 million in year one.

## MACROECONOMIC IMPACTS

In addition to estimating the direct impacts of interchange fee legislation like HSB 324, CSI can evaluate the likely indirect economic impacts of such a law on Iowa's economy using macroeconomic modeling. To conduct this analysis, CSI utilized the Tax-PI+ software for the state of Iowa from Regional Economic Models, Inc. (REMI). The Tax-PI+ software is a dynamic input-output (I-O) model allowing users to simulate the direct, indirect, and induced effects of policies impacting the state's economy. For this analysis, CSI modeled estimates of the impacts of implementing a bill like HSB 324 in Iowa. This framework allows for an easier conceptualization of the likely costs of implementation and is likely one of the more feasible methods for implementing such a law. The model assumes the inputs presented in table 1, which affect merchants, banks, and consumers to varying levels in the first year of implementation.

**FIGURE 8.**

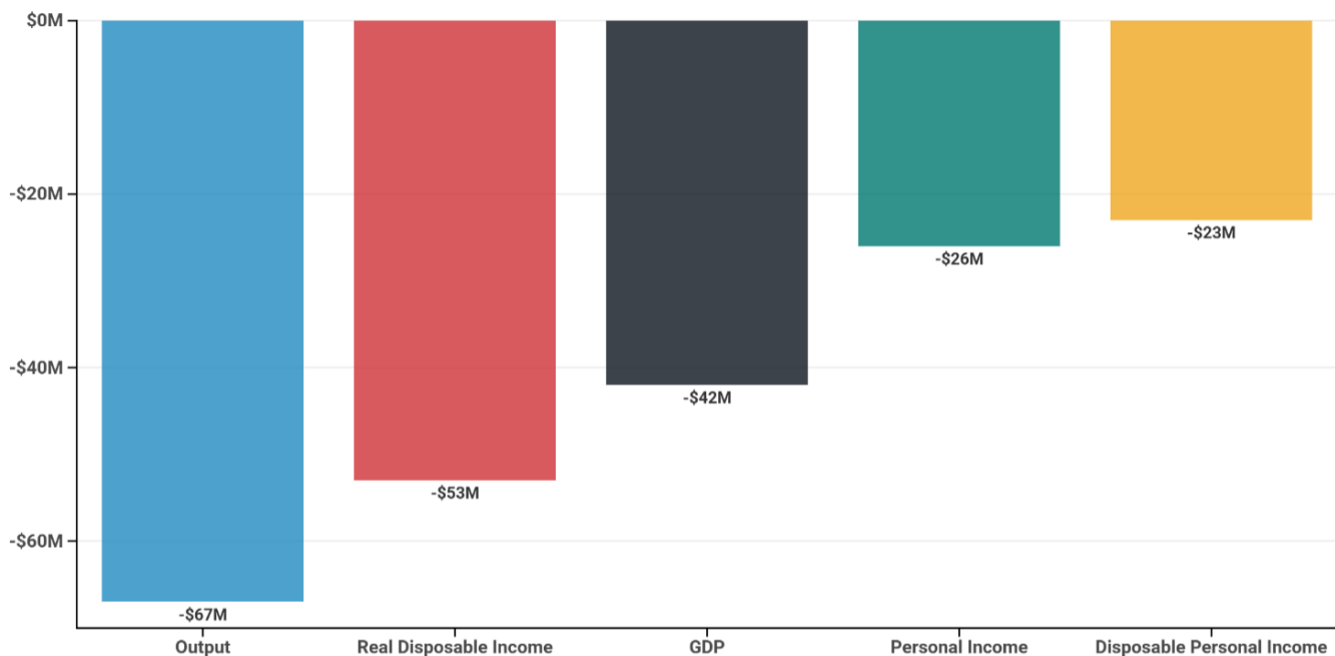
### Projected Labor & Population Impact of HSB 324-style Legislation in Iowa, Year 1



The simulation predicts that an HSB 324-style restriction on interchange fees would reduce total employment in Iowa by 351 jobs in year one relative to the REMI model's baseline. This loss amounts to a 0.2% reduction in Iowa's employment growth for the year. These population and labor market disruptions have direct consequences on Iowa's economic vitality. Figure 9 visualizes the effect on Iowa's economic output, GDP, personal income, and other measures.

**FIGURE 9.**

### Projected Economic Impact of HSB 324-style Legislation in Iowa, Year 1



Iowa's economic output would contract by \$67 million in year one, with GDP falling \$42 million and total personal income declining \$26 million relative to baseline. That single-year output loss alone exceeds 185% of the \$36.2 million in annual interchange savings merchants would realize under the law.

The estimates above reflect CSI's central simulation of an HSB 324-style restriction, assuming the law can be implemented as written and that the payment ecosystem adapts at the costs modeled. That is a generous assumption. As discussed earlier in this report, significant skepticism remains as to whether such a law is workable at all, given that it imposes state-specific restrictions on a payment system engineered to operate globally. If implementation proves infeasible, card issuers and networks may have little choice but to curtail or withdraw card services in Iowa rather than absorb the costs of reengineering their systems for a single state. The following scenario explores what Iowa stands to lose if that outcome materializes.

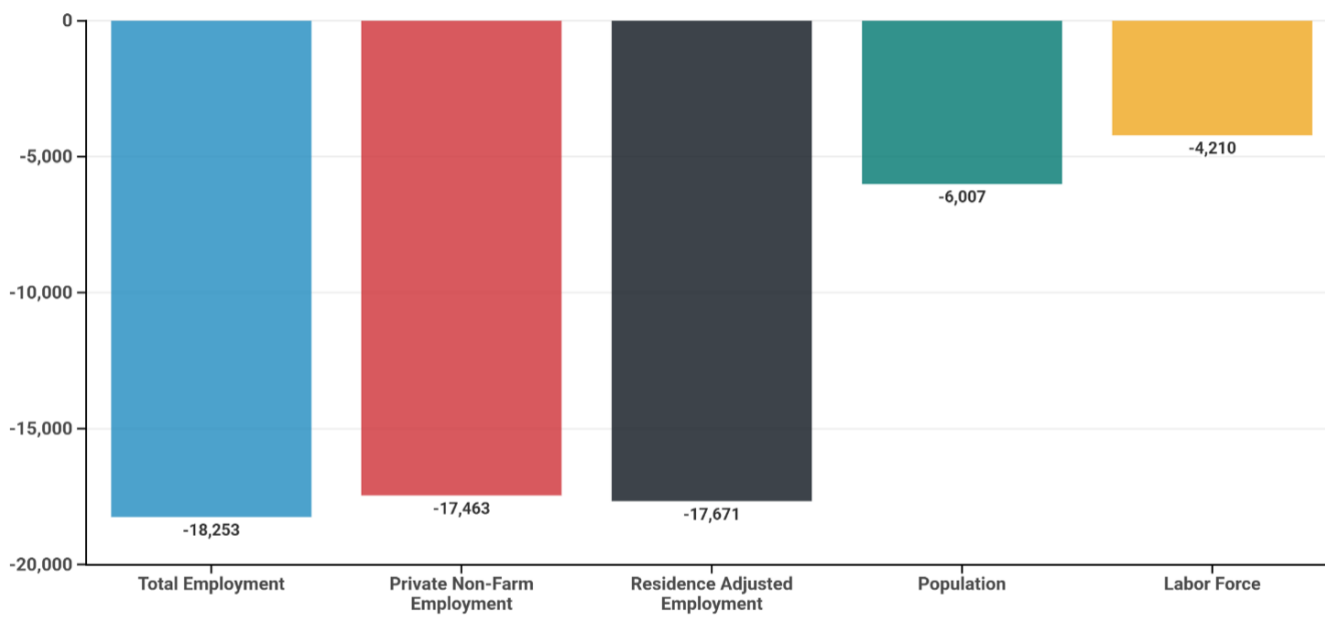
## Modeling a Worst-case Scenario

To illustrate the upper-bound risk of this policy, the report also constructs a scenario in which HSB 324 proves unworkable in practice. The following model takes total personal consumption expenditures from REMI and conservatively assumes 35% are made with a card—a figure well below the card share of retail or taxable sales, reflecting that large transactions often flow through ACH, wire, and other non-card channels. It then assumes a 5% reduction in those card-based expenditures, with the remaining 95% shifting to other payment methods. This calculation would capture a near-collapse of card functionality in Iowa in the event that the statute cannot be implemented as written and card issuers face penalties that force them to curtail or withdraw services in the state.

This 5% reduction is not a point estimate of HSB 324's expected impact. Rather, it is a stress test to attempt to quantify what Iowa stands to lose if card-based transactions are meaningfully disrupted. The mechanisms driving the reduction include higher transaction costs associated with cash handling, the exclusion of consumers from online commerce, and the growing share of Iowa businesses that no longer accept cash at all. This estimate is also conservative given e-commerce alone accounted for 16.4% of total U.S. retail sales in 2025.<sup>48</sup> These factors suggest roughly one in six retail dollars is now spent through channels that functionally cannot operate without card payments. The share of cashless businesses has also climbed, with about 18% of businesses in the United States not accepting cash.<sup>49</sup> Given these conditions, a 5% contraction is on the lower end of any real disruption Iowa consumers and merchants could face. Figure 10 visualizes the economic impact of such a scenario on Iowa's labor market and population in year one.

**FIGURE 10.**

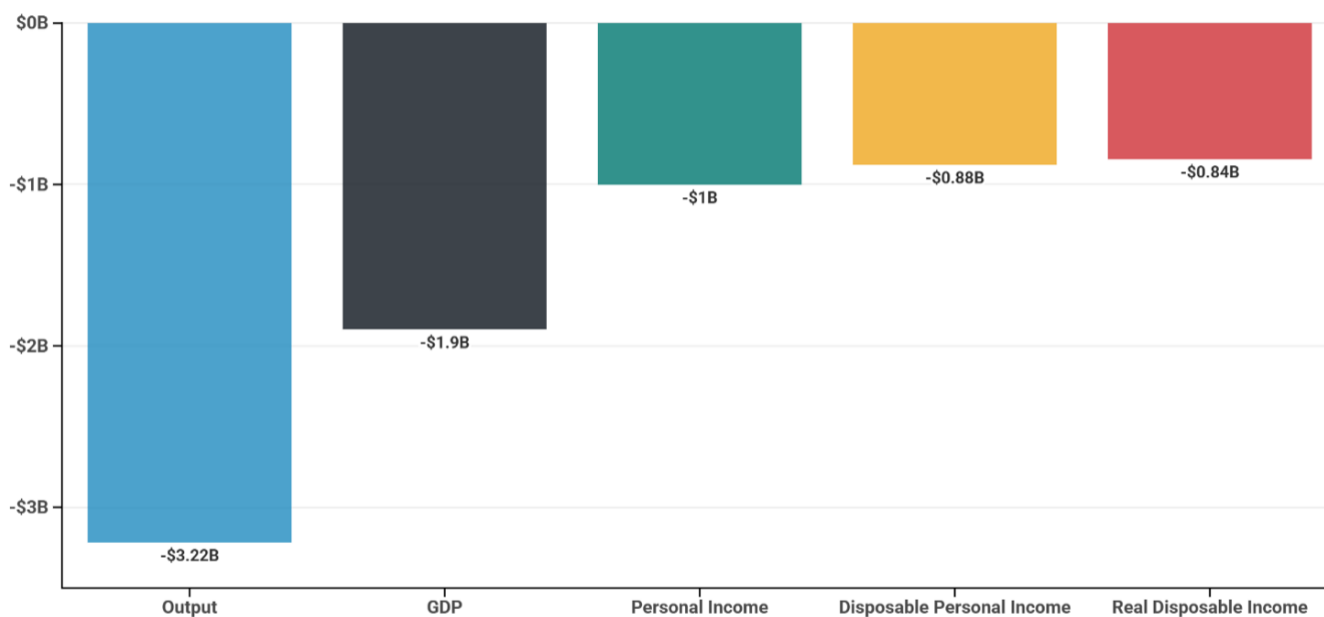
### Projected labor and population effects of HSB 324-style legislation in Iowa under a 5% card-spending contraction, Year 1



Under this scenario, Iowa's economy would contract sharply. Total employment would fall by 18,253 jobs in year one relative to baseline—roughly 52 times the loss estimated under the central simulation—with private nonfarm employment down 17,463 jobs and residence-adjusted employment down 17,671. The state's labor force would shrink by 4,210, and the population would fall by 6,007 as workers relocate in response to diminished economic opportunity. These effects on Iowa's population and labor market have direct consequences on Iowa's economic vitality. Figure 11 visualizes this scenario's effect on Iowa's economic output, GDP, personal income, and other measures.

**FIGURE 11.**

### Projected economic impact of HSB 324-style legislation in Iowa under a 5% card-spending contraction, Year 1



The economic damage is similarly severe. Output would contract by \$3.22 billion in year one, with GDP falling \$1.9 billion and personal income declining \$1 billion relative to baseline. Real disposable personal income (2017 dollars) would fall by \$840 million, and nominal disposable personal income would fall by \$880 million.

The first-order benefits of HSB 324—roughly \$36.2 million in annual interchange savings for Iowa merchants—are trivial compared to the losses Iowa would sustain if the statute disrupts card acceptance even modestly. A 5% contraction in card-based consumer spending is one plausible response if card issuers and networks find it infeasible to comply with a state-specific restriction on a system designed to operate seamlessly across jurisdictions. Whether that response materializes depends on how issuers, networks, and merchants ultimately adapt to the statute's requirements.

## FINAL NOTES

The impacts outlined here are illustrative of the economic damage such laws can inflict on a state's economy, but the analysis does not capture the full distribution of those impacts. Smaller merchants, as noted earlier in this report, are likely to bear a disproportionate share of implementation costs while realizing smaller proportional savings. Larger retailers—who account for a significant share of taxable sales and are better positioned to absorb fixed upgrade costs—would capture most of the benefit. The likely result is increased market concentration in Iowa's retail sector at the expense of smaller, locally owned businesses.

This analysis also does not account for longer-term behavioral responses that compound over time. If card issuers respond to lost interchange revenue by scaling back rewards programs, raising account fees, or tightening credit standards—as occurred following the Durbin Amendment—Iowa cardholders would bear costs well beyond those captured in the simulation. The Durbin experience is instructive, in that merchant savings from that law did not translate into lower consumer prices, and cardholders absorbed an estimated \$25 billion in lost perks and higher fees. There is little reason to expect a different pattern under HSB 324.

Finally, it bears repeating that significant uncertainty surrounds whether a law like HSB 324 can be implemented at all. The central simulation reflects the best estimate of economic impacts if the implementation hurdles can be overcome. The difficulty with laws like HSB 324 is that they impose state-specific restrictions on a payment system built to function globally. Modifying that system to accommodate the requirements of a single state within a single country may prove cost-prohibitive for the parties involved. In that case, the more likely outcome is that card issuers and networks curtail or withdraw card services in Iowa rather than absorb the costs of compliance. The worst-case scenario modeled above offers a sense of what the economic consequences of that outcome could look like.

## BOTTOM LINE

Laws that attempt to restrict interchange fees are yet another instance of government price controls. These laws are often sold as a necessary government intervention to save consumers and small businesses money, but in practice they often impose significant costs on those they were intended to help. Policymakers and the public should be wary of arguments that exclusively point to the costs associated with the payment card system, without considering the costs of disrupting the existing card payment system or the net benefits that accrue to the economy as a result of card payments. As this analysis shows, the effort to artificially limit the costs associated with payment cards can come with detrimental economic consequences, with the lion's share of benefits accruing to a few large retailers.

## APPENDIX – KEY TERMS AND DEFINITIONS

**Acquirer** – The financial institution that facilitates electronic payment transactions for merchants. Often referred to as the acquiring bank, or merchant’s bank.

**Clearing** – The process where acquiring and issuing banks exchange payment information regarding a transaction. Once the issuing bank validates the transaction and provides the card network with necessary financial information, the transaction is said to have “cleared” and can proceed to settlement.

**Gateway** – A service provider that securely facilitates the transfer of payment information between a merchant’s website or point-of-sale (POS) system and the payment processor or acquiring bank.

**Issuer** – The financial institution that provides payment cards (credit, debit, or prepaid cards) to consumers and businesses. The issuer manages the cardholder’s account and is often referred to as the issuing bank.

**Network** – Networks facilitate the transfer of payment information between the acquirer and the issuer and ensure funds are transferred from the issuer to the acquirer.

**Payment Processor** – A company that provides technology services to process electronic payments for merchants. Payment processors are responsible for sending the payment card data and other information to the card network and to the issuer. Both acquirers and issuers can act as payment processors, but both can also utilize third-party companies to handle payment processing.

**Settlement** – The final process in a payment card transaction where funds are electronically transferred from the issuer to the acquirer. This stage often occurs at a later time or date than the original transaction, whereas the clearing process takes place when the transaction is performed.

1. Austin Jensen, "Pass Swipe Fee Reform Prove Wall St Doesn't Own Washington," Retail Industry Leaders Association, May 19, 2025, <https://www.rila.org/blog/2025/05/pass-swipe-fee-reform-prove-wall-st-doesnt-own-was>.
2. Zach Milne, "The Economic Impact of State Restrictions on Interchange Fees," Common Sense Institute, February 3, 2025, <https://www.common senseinstituteus.org/iowa/research/taxes-and-fees>.
3. An Act excluding interchange fees imposed upon certain taxes at points of sale, HSB 324, State of Iowa 91st General Assembly (2026), <https://www.legis.iowa.gov/legislation/BillBook?ga=91&ba=HSB324>.
4. "EPC Q3 2024 Data Dashboard", Electronic Payments Coalition, October 10, 2024.
5. John Egan, "Know your rights when facing credit card fraud," Bankrate, January 12, 2023, <https://www.bankrate.com/credit-cards/advice/know-your-rights-credit-card-fraud/>; Sara Lebow, "Card-not-present fraud to make up 73% of card payment fraud," Emarketer, January 23, 2023, <https://www.emarketer.com/content/card-not-present-fraud-payment>.
6. Thomas Young and Ben Murrey, "The Impact of Financial Fraud in Iowa," Common Sense Institute Iowa, August 21, 2025, <https://www.common senseinstituteus.org/iowa/research/crime-and-public-safety/the-impact-of-financial-fraud-in-iowa>.
7. Ade O'Connor, "Every Dollar Lost to Fraud Costs North America's Financial Institutions \$5, According to LexisNexis Risk Solutions," LexisNexis Risk Solutions, September 10, 2025, <https://risk.lexisnexis.com/about-us/press-room/press-release/20250910-fraud-multiplier>
8. "Charge-Off and Delinquency Rates on Loans and Leases at Commercial Banks," Board of Governors of the Federal Reserve System, accessed April 14, 2026, <https://www.federalreserve.gov/releases/chargeoff/chgallsa.htm>.
9. Joe Kefauver, "Despite their claims, Visa and Mastercard can more than afford swipe fee reform," Chain Store Age, July 9, 2024, <https://chainstoreage.com/despite-their-claims-visa-and-mastercard-can-more-afford-swipe-fee-reform>.
10. "Debit Card Interchange Fees and Routing; Final Rule," Board of Governors of the Federal Reserve System, Federal Register 76, no. 139 (July 20, 2011): 43394–43478, <https://www.federalregister.gov/d/2011-16861/p-100>
11. "Surcharging Credit Cards—Q&A for Merchants," VISA, accessed May 6, 2026, <https://usa.visa.com/dam/VCOM/download/merchants/surcharging-faq-by-merchants.pdf>.
12. Marc Rysman, "The Economics of Two-Sided Markets," Journal of Economic Perspectives 23, no. 3 (2009): 125–43, <https://www.aeaweb.org/articles?id=10.1257/jep.23.3.125>.
13. Marc Rysman, "The Economics of Two-Sided Markets," Journal of Economic Perspectives 23, no. 3 (2009): 125–43, <https://www.aeaweb.org/articles?id=10.1257/jep.23.3.125>.
14. "Facebook Help Center: About our Policies," Facebook, accessed April 14, 2026, <https://www.facebook.com/help/186556401394793/>.
15. "State of the Industry Report," CMSPI, September 2024, <https://cmspi.com/publication/state-of-the-industry-report/>.
16. "State of the Industry Report," CMSPI, September 2024, <https://cmspi.com/publication/state-of-the-industry-report/>.
17. Kevin Foster, Claire Greene, and Joanna Stavins, "2023 Survey and Diary of Consumer Payment Choice: Summary Results," Federal Reserve Bank of Atlanta, 2024, [https://www.atlantafed.org/-/media/Project/Atlanta/FRBA/Documents/banking/consumer-payments/survey-diary-consumer-payment-choice/2023/sdcpc\\_2023\\_report.pdf](https://www.atlantafed.org/-/media/Project/Atlanta/FRBA/Documents/banking/consumer-payments/survey-diary-consumer-payment-choice/2023/sdcpc_2023_report.pdf).
18. "Interchange Fee Revenue, Covered Issuer Costs, and Covered Issuer and Merchant Fraud Losses Related to Debit Card Transactions: Table 4," Board of Governors of the Federal Reserve System, January 7, 2026, [https://www.federalreserve.gov/paymentsystems/files/debitfees\\_costs\\_2023.pdf](https://www.federalreserve.gov/paymentsystems/files/debitfees_costs_2023.pdf).
19. Nathaniel Teres, "Credit Card Interchange: The Cost of Accepting Cash," Consumer Bankers Association, June 2, 2025, <https://consumerbankers.com/blog/credit-card-interchange-the-cost-of-accepting-cash/#:~:text=According%20to%20a%20report%20by,costly%20than%20it%20may%20appear>.
20. Abby Wines, "Death Valley National Park to move to cashless fee collection starting June 1, 2023," National Park Service, April 12, 2023, <https://www.nps.gov/deva/learn/news/cashless.htm>.
21. Robert M. Grant, "Transaction Costs to Retailers of Different Methods of Payment: Results of a Pilot Study", Managerial & Decision Economics, Vol. 4, No. 2, pp. 89-96, June 1983, <https://www.jstor.org/stable/2487668>; "Retailer Payment Systems: Relative Merits of Cash and Payment Cards", Economists Incorporated, November 19, 2014, [https://ei.com/wp-content/uploads/2015/01/Cost\\_of\\_Cash\\_Study.pdf](https://ei.com/wp-content/uploads/2015/01/Cost_of_Cash_Study.pdf).
22. Throughput is the rate at which a merchant sells its goods and services to customers. By decreasing checkout times (increasing efficiency) merchants can serve more customers and thus increase revenues.
23. Anne Layne-Farrar, "Are Debit Cards Really More Costly for Merchants? Assessing Retailers' Costs and Benefits of Payment Instrument Acceptance", September 9, 2011, [https://papers.ssrn.com/sol3/papers.cfm?abstract\\_id=1924925](https://papers.ssrn.com/sol3/papers.cfm?abstract_id=1924925).
24. Noah MacDonald and Brent Evans, "A Theoretical Examination of Cash-Back Credit Cards and Their Effect on Consumer Spending", Financial Services Review, March 5, 2020, <https://openjournals.libs.uga.edu/fsr/article/view/3428/3051>.
25. "Interchange Fee Revenue, Covered Issuer Costs, and Covered Issuer and Merchant Fraud Losses Related to Debit Card Transactions: Table 5", Board of Governors of the Federal Reserve System, January 07, 2026, [https://www.federalreserve.gov/paymentsystems/files/debitfees\\_costs\\_2023.pdf](https://www.federalreserve.gov/paymentsystems/files/debitfees_costs_2023.pdf).
26. Todd Zywicki, Geoffrey Manne, Julian Morris, "Price Controls on Payment Card Interchange Fees: The U.S. Experience", International Center for Law and Economics, January 14, 2020, [https://papers.ssrn.com/sol3/papers.cfm?abstract\\_id=2446080](https://papers.ssrn.com/sol3/papers.cfm?abstract_id=2446080).
27. David S. Evans, Howard H. Chang and Steven Joyce, "The Impact of the U.S. Debit Card Interchange Fee Caps on Consumer Welfare: An Event Study Analysis" Coase-Sandor Institute for Law & Economics, No. 658, 2013, [https://chicagounbound.uchicago.edu/law\\_and\\_economics/652/](https://chicagounbound.uchicago.edu/law_and_economics/652/).
28. Renee Haltom and Zhu Wang, "Did the Durbin Amendment Reduce Merchant Costs? Evidence from Survey Results," Federal Reserve Bank of Richmond, December 2015, [https://www.richmondfed.org/-/media/RichmondFedOrg/publications/research/economic\\_brief/2015/pdf/eb\\_15-12.pdf](https://www.richmondfed.org/-/media/RichmondFedOrg/publications/research/economic_brief/2015/pdf/eb_15-12.pdf).

29. "ETA Opposition to RI HB 8212," Electronic Transactions Association, March 11, 2026,
30. Creates the Neighborhood Concert Tax Act, HB 4951, State of Illinois 103rd General Assembly (2024), <https://www.ilga.gov/Legislation/BillStatus?DocNum=4951&GAID=17&DocTypeID=HB&LegID=152864&SessionID=112&GA=103>.
31. "Business Transactions (815 ILCS 151/) Interchange Fee Prohibition Act", Illinois Compiled Statutes, [https://ilga.gov/Legislation/ILCS/Articles?ActID=4515&ChapterID=67#:~:text=\(a\)%20An%20issuer%2C%20a,part%20of%20the%20authorization%20or](https://ilga.gov/Legislation/ILCS/Articles?ActID=4515&ChapterID=67#:~:text=(a)%20An%20issuer%2C%20a,part%20of%20the%20authorization%20or).
32. An Act excluding interchange fees imposed upon certain taxes at points of sale, HSB 324, State of Iowa 91st General Assembly (2026), <https://www.legis.iowa.gov/legislation/BillBook?ga=91&ba=HSB324>.
33. Brendan McDermid, "The \$8.65 Billion Shift to New Credit Cards Won't Fix Security Issues", Entrepreneur, March 3, 2015, <https://www.entrepreneur.com/business-news/the-865-billion-shift-to-new-credit-cards-wont-fix/243555>; Stephanie Cho, "EMV & the Fraud Liability Shift: What It Means for Your Business", Fraud Fighter, September 11, 2015, <https://blog.fraudfighter.com/counterfeit-detection-id-verification/emv-the-fraud-liability-shift-what-it-means-for-your-business>.
34. "2024 Payment Security Report," Verizon Cyber Security Consulting, Verizon Business, October 3, 2024, <https://www.verizon.com/business/resources/Te3a/reports/2024-payment-security-report.pdf>
35. "Cost of a Data Breach Report 2025," International Business Machines and Ponemon Institute, Accessed April 16, 2026, <https://www.ibm.com/reports/data-breach>
36. Jeff John Roberts, "Home Depot to Pay Banks \$25 Million in Data Breach Settlement," Fortune, March 9, 2017, <https://fortune.com/2017/03/09/home-depot-data-breach-banks/>.
37. "Quarterly Retail Sales Tax Data by County and City," Iowa Department of Revenue, January 15, 2026, [https://data.iowa.gov/Taxes-Tax-Credits/Quarterly-Retail-Sales-Tax-Data-by-County-and-City/55fz-vque/about\\_data](https://data.iowa.gov/Taxes-Tax-Credits/Quarterly-Retail-Sales-Tax-Data-by-County-and-City/55fz-vque/about_data); "Cigarette and Tobacco Revenue," Iowa Department of Revenue, April 13, 2026, [https://data.iowa.gov/State-Government-Finance/Cigarette-and-Tobacco-Revenue/psaj-umr5/about\\_data](https://data.iowa.gov/State-Government-Finance/Cigarette-and-Tobacco-Revenue/psaj-umr5/about_data); "Taxable Gallons of Fuel by Major Fuel Type in Iowa," Iowa Department of Revenue, January 29, 2026, [https://data.iowa.gov/Sales-Distribution/Taxable-Gallons-of-Fuel-by-Major-Fuel-Type-in-Iowa/dsvg-39et/about\\_data](https://data.iowa.gov/Sales-Distribution/Taxable-Gallons-of-Fuel-by-Major-Fuel-Type-in-Iowa/dsvg-39et/about_data).
38. Berhan Bayeh, Isaiah Nardone, Shaun O'Brien and Hailey Phelps, "2025 Findings from the Diary of Consumer Payment Choice", The Federal Reserve Financial Services, <https://www.frbfinancialservices.org/news/research/2024-findings-from-the-diary-of-consumer-payment-choice>
39. "Retail Sales and Retail Use Business Registrations," Iowa Department of Revenue, State of Iowa, April 20, 2026, [https://data.iowa.gov/Taxes-Tax-Credits/Retail-Sales-and-Retail-Use-Business-Registrations/9k3w-7fwi/about\\_data](https://data.iowa.gov/Taxes-Tax-Credits/Retail-Sales-and-Retail-Use-Business-Registrations/9k3w-7fwi/about_data).
40. Cindy Liu, "Walmart Tops List of Leading US Retailers by 2023 Sales," Forrester, September 3, 2024, <https://www.forrester.com/blogs/walmart-tops-list-of-leading-us-retailers-by-2023-sales>.
41. "Retail Sales and Use Taxes Annual Report Fiscal Year 2025: Table 5. Retail Taxable Sales and Tax by Amount of Taxable Sales Reported on Quarterly or Annual Returns Fiscal Year 2025," Iowa Department of Revenue, State of Iowa, February 2026, <https://revenue.iowa.gov/media/4462/download?inline>.
42. "Quarterly Retail Sales Tax Data by County and City," Iowa Department of Revenue, January 15, 2026, [https://data.iowa.gov/Taxes-Tax-Credits/Quarterly-Retail-Sales-Tax-Data-by-County-and-City/55fz-vque/about\\_data](https://data.iowa.gov/Taxes-Tax-Credits/Quarterly-Retail-Sales-Tax-Data-by-County-and-City/55fz-vque/about_data); Berhan Bayeh, Isaiah Nardone, Shaun O'Brien and Hailey Phelps, "2025 Findings from the Diary of Consumer Payment Choice", The Federal Reserve Financial Services, <https://www.frbfinancialservices.org/news/research/2024-findings-from-the-diary-of-consumer-payment-choice>; "Interchange Fee Revenue, Covered Issuer Costs, and Covered Issuer and Merchant Fraud Losses Related to Debit Card Transactions: Table 1", Board of Governors of the Federal Reserve System, January 07, 2026, <https://www.federalreserve.gov/paymentsystems/regii-data-collections.htm>; Estimating the true average interchange rates for fees paid in Iowa is impossible. As a simplifying assumption CSI used the debit interchange amount for regulated issuers, which accounts for nearly 70% of total value of debit transactions, and for credit assumed an average interchange fee of 1.65% + \$0.10.
43. "Retail Sales and Retail Use Business Registrations," Iowa Department of Revenue, State of Iowa, April 20, 2026, [https://data.iowa.gov/Taxes-Tax-Credits/Retail-Sales-and-Retail-Use-Business-Registrations/9k3w-7fwi/about\\_data](https://data.iowa.gov/Taxes-Tax-Credits/Retail-Sales-and-Retail-Use-Business-Registrations/9k3w-7fwi/about_data).
44. Olivia Chen and Sally Lauckner, "How Much Does a POS System Cost?," NerdWallet, June 27, 2023, <https://www.nerdwallet.com/business/software/learn/pos-system-cost?>; Tessa Zuluaga, "How Much Does a POS System Cost?," Toast, December 8, 2025, <https://pos.toasttab.com/blog/on-the-line/how-much-does-a-pos-system-cost>.
45. David S. Evans, Howard H. Chang and Steven Joyce, "The Impact of the U.S. Debit Card Interchange Fee Caps on Consumer Welfare: An Event Study Analysis" Coase-Sandor Institute for Law & Economics, No. 658, 2013, [https://chicagounbound.uchicago.edu/law\\_and\\_economics/652/](https://chicagounbound.uchicago.edu/law_and_economics/652/)
46. Eric M. Richardson, "Iowa Gross Domestic Product – Nominal Basis," Iowa Legislative Agency, accessed April 17, 2026, <https://www.legis.iowa.gov/docs/publications/IET/615753.pdf>.
47. John Heggstuen, "The Rollout Of Credit Cards With Embedded Microchips Will Be Costly, But It's Also A Huge Business Opportunity," Business Insider, April 7, 2014, <https://www.businessinsider.com/the-rollout-of-credit-cards-with-embedded-microchips-will-be-costly-but-its-also-a-huge-business-opportunity-2014-4>
48. "Quarterly Retail E-Commerce Sales," United States Census Bureau, March 10, 2026, <https://www.census.gov/retail/ecommerce.html>.
49. Paxtyn Merten, "The Cashless Shift in America: What It Means for Shoppers and Businesses," Unicode, December 11, 2025, <https://www.uniqode.com/blog/trending-use-cases/the-cashless-shift-in-america-what-it-means-for-shoppers-and-businesses>.