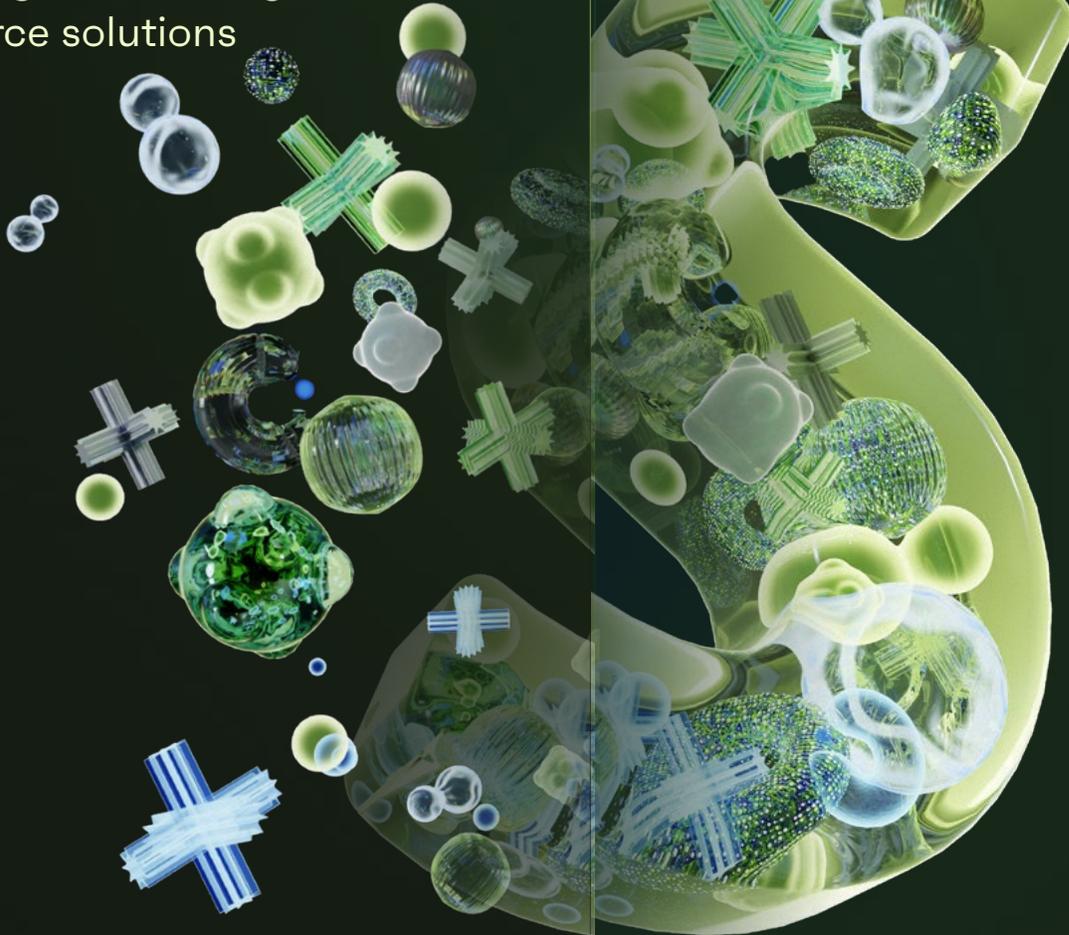
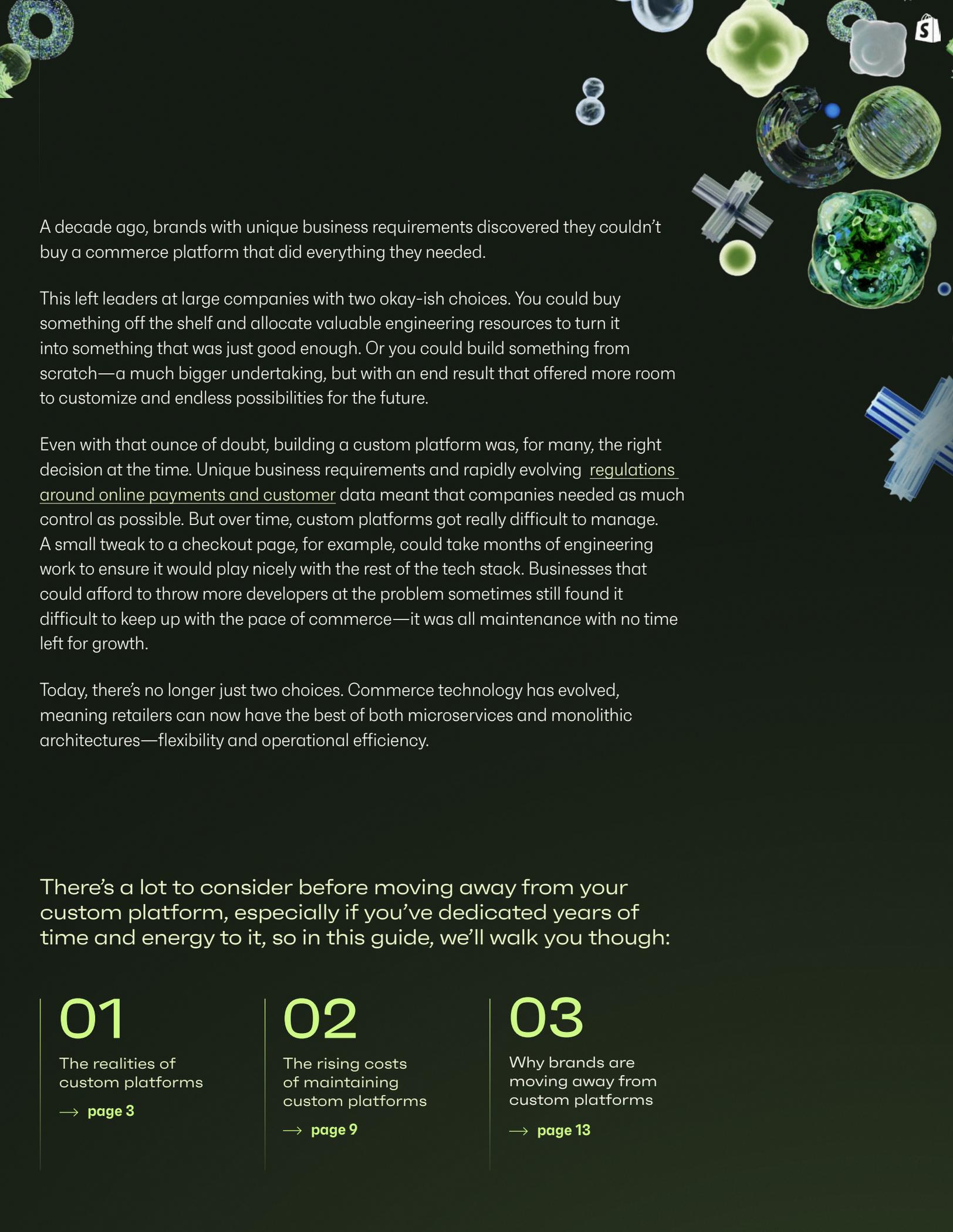


# The realities of maintaining a custom platform

Why leading brands are  
rethinking their homegrown  
commerce solutions





A decade ago, brands with unique business requirements discovered they couldn't buy a commerce platform that did everything they needed.

This left leaders at large companies with two okay-ish choices. You could buy something off the shelf and allocate valuable engineering resources to turn it into something that was just good enough. Or you could build something from scratch—a much bigger undertaking, but with an end result that offered more room to customize and endless possibilities for the future.

Even with that ounce of doubt, building a custom platform was, for many, the right decision at the time. Unique business requirements and rapidly evolving regulations around online payments and customer data meant that companies needed as much control as possible. But over time, custom platforms got really difficult to manage. A small tweak to a checkout page, for example, could take months of engineering work to ensure it would play nicely with the rest of the tech stack. Businesses that could afford to throw more developers at the problem sometimes still found it difficult to keep up with the pace of commerce—it was all maintenance with no time left for growth.

Today, there's no longer just two choices. Commerce technology has evolved, meaning retailers can now have the best of both microservices and monolithic architectures—flexibility and operational efficiency.

There's a lot to consider before moving away from your custom platform, especially if you've dedicated years of time and energy to it, so in this guide, we'll walk you through:

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The rising costs of maintaining custom platforms

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Why brands are moving away from custom platforms

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# The realities of custom platforms

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With that 40%, we thought to ourselves, what else could we unlock? What else could we do with that 40% instead of simply maintaining our platform? What else could we build? What else could we leverage? How could we drive more results in those primary KPIs?

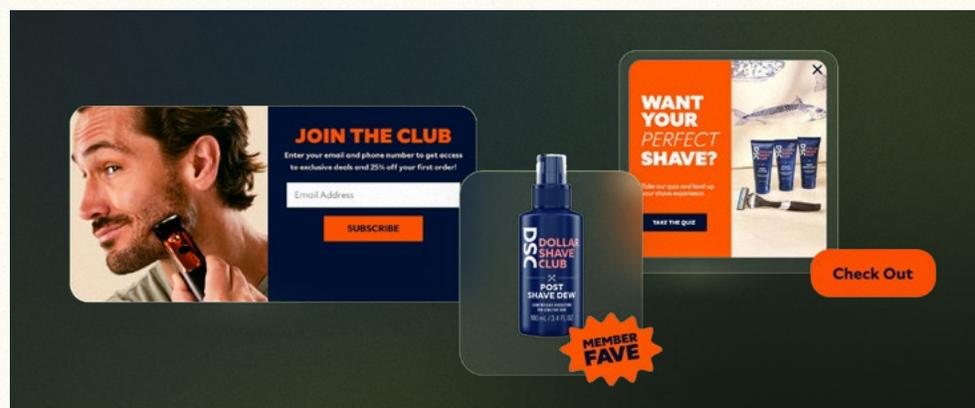
**Kyle Iwamoto**

Vice President of Ecommerce  
Dollar Shave Club

→ [READ CASE STUDY](#)

It's worth reemphasizing how there were a lot of really good reasons for building custom platforms when you built yours. Going custom was the clearest path to building commerce experiences that fit your brand's unique criteria. But in the time since, custom platforms have proven to be expensive to build, time-consuming to maintain, and offer no guarantees that everything will just work.

Before moving away from their custom platform, Dollar Shave Club was spending 40% of their entire technology budget on platform maintenance. "Sometimes, there's a misconception that building something in-house means it's free in the long run," said Kyle Iwamoto, their VP of Ecommerce. "But developing it diverts resources from other important projects, and maintaining it isn't free either."



Costs aside, there's an undeniable aura around building any piece of software from scratch. The best engineering teams can (or should be able to) write their way out of any challenge with code. How great would it be to ship a best-in-class ecommerce platform that you built entirely in-house?



[There were a lot of] complexities by being a legacy, homegrown site. Our engineers had to either fix things they built themselves or engage with a third-party provider.

YuJin Yong  
VP of Digital, Daily Harvest

→ READ CASE STUDY

The problem is, according to research from Forrester, 30% of digital projects fail in their first year, often because companies try to do too much, too quickly. In commerce, technology that's difficult to scale has a trickle-down effect on business users across your organization. Seemingly simple tasks like creating and merchandising products are often added to the end of your engineering team's backlog. Not only does this pull developers away from innovative work, but it slows the entire business down and decelerates your path to growth.

This was the case at Daily Harvest, according to YuJin Yong, VP of digital. YuJin says that instead of bringing business-changing ideas to life, Daily Harvest's engineers spent most of their time fixing issues that popped up daily with their homegrown platform.



But what if money is no object and you're willing to spend millions of dollars on a custom platform? And what if you're willing to spend an unspecified amount of time fixing bugs, rewriting code, and maintaining everything yourself? There are still two hard truths to building a custom platform—and both of them are worth discussing further:

1

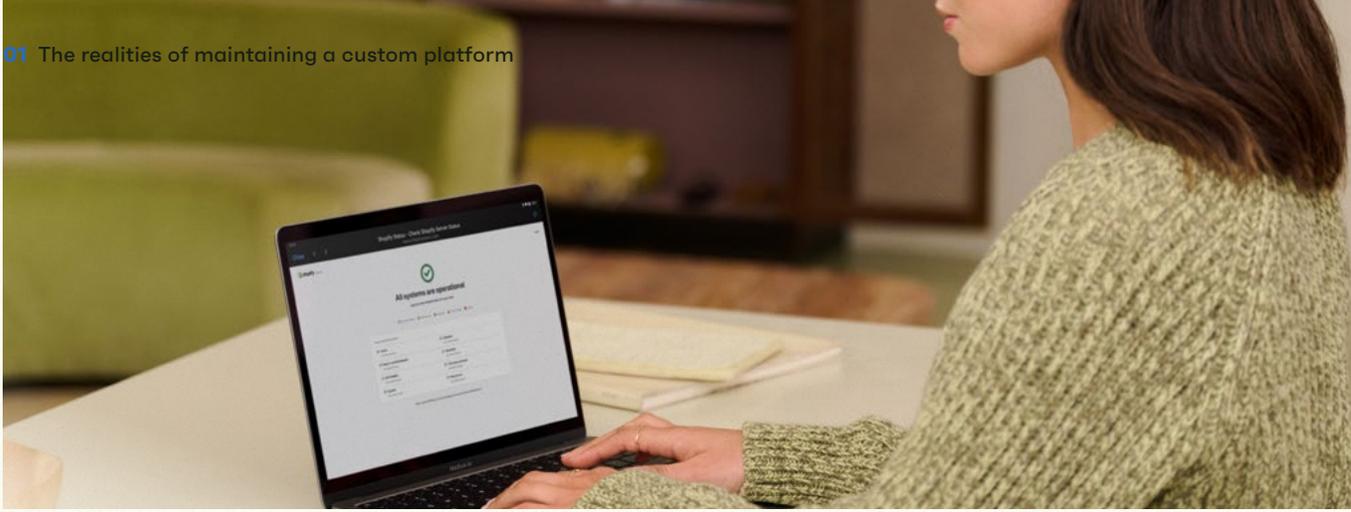
Businesses at all stages are struggling to keep up with the rate of change in commerce



2

Building a checkout experience from scratch is all risk, no reward





1

## Businesses at all stages are struggling to keep up with the rate of change in commerce



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Companies that cultivate a detailed, up-to-date understanding of today’s and tomorrow’s consumers—who they are, what they want, and where and how they shop—will be best positioned to succeed.

McKinsey & Company recently published a report that confirms good news is on the horizon for basically every retailer on the planet: Customers are ready to spend.

Not surprisingly, McKinsey’s research found that people of retirement age are gearing up to spend big this year and beyond. What was more surprising was how middle-income consumers were just as eager to splurge on discretionary items at rates that are comparable to higher-earning shoppers.

In other words, your customers will likely be more diverse than ever before—and the rate at which commerce evolves will only accelerate exponentially.

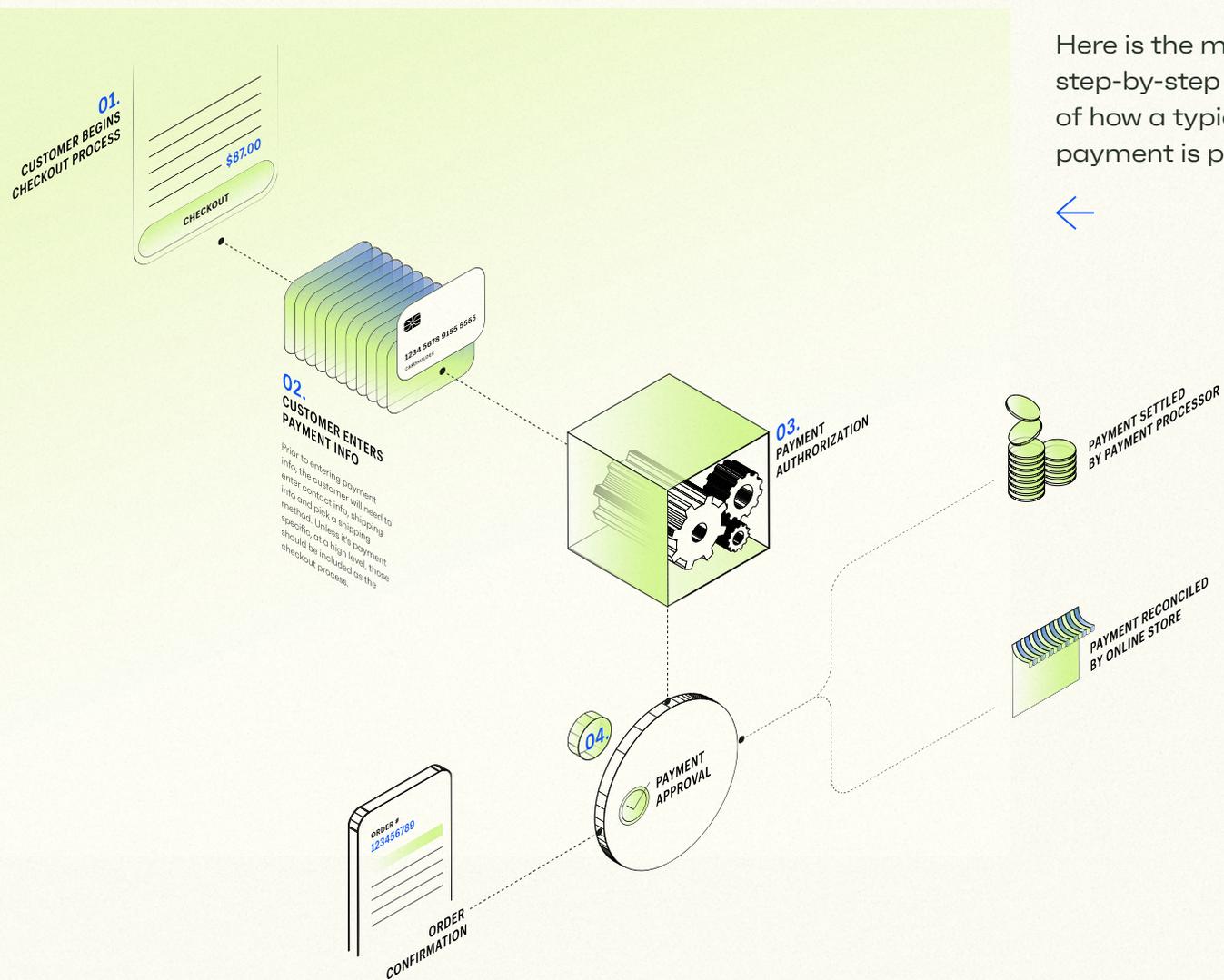
In the same report, McKinsey found that the habits of online shoppers have never been more complex. They add, “Companies that cultivate a detailed, up-to-date understanding of today’s and tomorrow’s consumers—who they are, what they want, and where and how they shop—will be best positioned to succeed.”

Even when you have a deep understanding of what your customers want, there are so many layers to building a custom platform that meets all of their needs. While your teams toil over basic infrastructure and maintenance, you lose ground to competitors that are more focused on unlocking new customer acquisition channels and creating unique online shopping experiences.

2

# Building a checkout experience from scratch is all risk, no reward

If there's consensus about anything in commerce, it's that building a checkout from scratch is incredibly difficult. To illustrate how big of a challenge it is, it's worth revisiting even the basics of processing an order online.

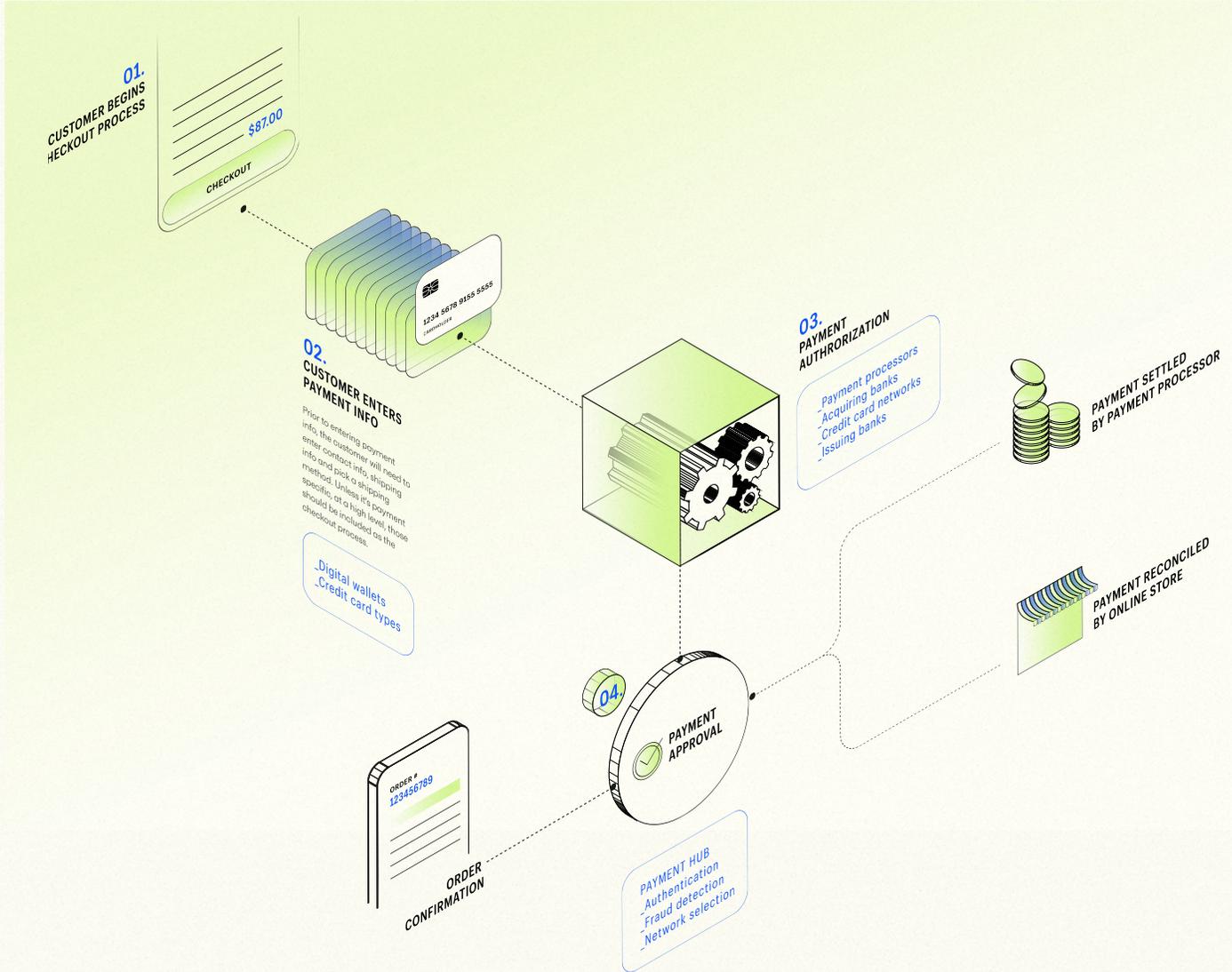


Here is the most basic step-by-step flowchart of how a typical online payment is processed:



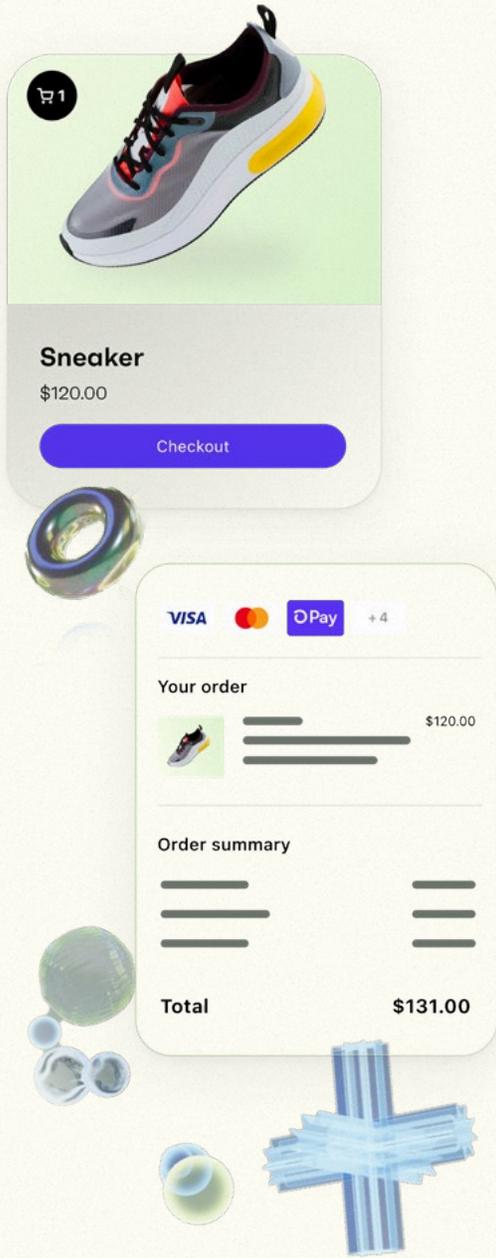
We've got seven tasks here in our basic flowchart that need to be completed in order for a customer to purchase something online. That may seem manageable, especially when you've got a large internal engineering team or comprehensive support from a development partner.

But take a look at what happens when you factor in all of the technologies and services that are required for our rudimentary checkout experience



All of a sudden, your custom checkout requires you to figure out how it'll play nicely with the most popular digital wallets and credit card types. Once you've cracked that nut, you need to integrate everything you've built with a variety of payment processors, credit card networks, and payment hubs to deliver a seamless and secure checkout experience.

The amount of work required to build a checkout from scratch only multiplies when you expand to different buying audiences, sales channels, marketplaces, retail locations, and the variety of innovative online shopping experiences your customers expect. Still, many leaders might argue this is a selling point to get developers excited about coming to work. If you can lead a team to build a best-in-class checkout experience, it would immediately become one of the top achievements of your career, right? It sure would—but it also would mean accepting one of the biggest risks of having a fully custom checkout page: security.



In many cases, it only takes a couple lines of code for a bad actor to scrape payment and personal information from your customers. Back in 2020, the FBI issued a warning after a US-based business was targeted by a threat actor who inserted two pieces of PHP code into their checkout. Ultimately, everyone who bought something from that retailer online unknowingly sent their credit card information to those cyber actors.

When you create your own checkout page, there are some serious questions you need to be sure you can answer. More importantly, you need to ensure that you've got the right measures in place to protect your checkout against any of the following incidents:

**How easily could someone scrape credit card and personal data from your customers during the checkout process?**

**How easily could someone infiltrate other systems after breaching your custom checkout page?**

**Is your checkout experience compliant with constantly evolving international regulations such as GDPR?**

**How easily could a bad actor install malware onto the back end of your custom checkout?**

Sure, securing your checkout is really important. It's also not the best use of development time or resources, which should be dedicated to business-changing projects that can accelerate your company's growth. This is just one of several reasons why Shopify is committed to giving our customers best-in-class technical infrastructure and making proactive changes to keep it up-to-date and compliant.

# The rising costs of maintaining a custom platform

It's clear that building a custom platform is challenging from technological and innovation standpoints. Now, we're seeing countless examples of custom platforms being challenging from a cost perspective—and in 2024, it's very expensive to build a custom platform.

There are three ways that the costs of maintaining a custom platform are rising:

1

Technology fees add up quickly

2

Businesses aren't maximizing their investments in engineering



## Technology fees add up quickly—and sometimes quietly

Growing brands on custom platforms often end up on a never-ending flywheel, on which they tack on more functionality as business needs change. And as your tech stack grows, so too does the volume of work required to make sure everything runs smoothly.



The average  
company spends

**\$135K+**

in unused software  
licenses



Adding just one new application or integration could mean weeks of writing and debugging code, racing to understand new APIs, and ensuring that apps across your tech stack are communicating with each other properly. This is not exactly the type of work most developers get excited about.

Plus, recent market dynamics have also highlighted how quickly most businesses rushed to add new applications to their stacks without cross checking to ensure they didn't already have a service that solved that business problem. [A 2024 study by BetterCloud](#), a software-as-a-service (SaaS) management platform, found that a typical business has between two and three duplicative apps. The same report found that the average company spends more than \$135,000 on unused software licenses. While it's clear that technology leaders agree this is a problem that requires solving, it's also clear that the challenge is actually a symptom of building your own platform.

2

## Businesses aren't maximizing their investments in engineering

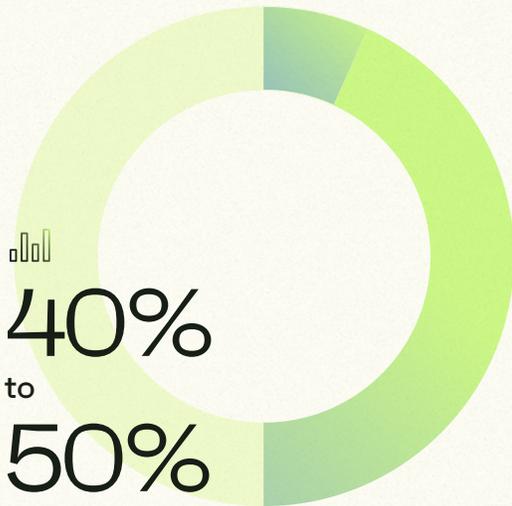


**40%**

to

**50%**

of developer's time  
spent on maintaining  
a midsize system.



It's no secret that software development roles are among the most difficult for any company to fill. The top engineering talent also comes at a high cost.

For roughly a decade, developers have accepted the reality that maintaining a midsize system will require between 40% and 50% of their time. While engineers might resign themselves to this reality, it doesn't mean they enjoy it.

Most engineers agree they should be focused on driving growth through code, and they're frustrated by the lack of time they have to do so. A 2023 survey by HackerEarth found that over 25% of developers who left their jobs said the primary reason for doing so was a lack of engineering culture that fosters innovation. When you have a custom platform, it's a big deal when an engineer leaves your company.

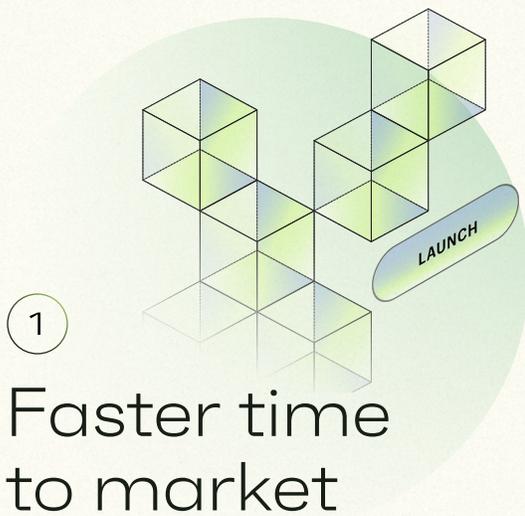
One of the biggest challenges of losing a developer is replacing the institutional knowledge that leaves when a developer takes a new job. When those insights walk out the door, it makes it more difficult for the remaining team to maintain and innovate on a custom platform. And even when you manage to replace that person with someone equally talented, it's an uphill battle for any engineer to jump into a custom tech stack and make an impact quickly.

**What are some of the other reasons brands are switching from custom platforms to Shopify? We're glad you asked.**



# Why brands are moving away from custom platforms

There is a long list of nuanced reasons why thousands of brands have switched from their custom platforms. While each migration story is unique, we can typically distill it down to four key factors that influence this decision:



## Faster time to market

All too often, custom platforms don't give businesses enough time or latitude to create a strategic roadmap that encourages innovation. The creative ideas you have need to wait when an urgent business need arises. While your engineering team is more than capable of integrating a new app or building custom functionality, doing so for just one feature could take anywhere from a week to a few months.



## Reduced maintenance

Custom platforms were once the only way to get the level of development flexibility you needed. A byproduct of that flexibility is that you also inherited all the risks of building out your own security posture and ensuring ongoing compliance. This is boring and tedious work that many developers just don't want to do, and prevents you from doing the work that could actually move your business forward.



3

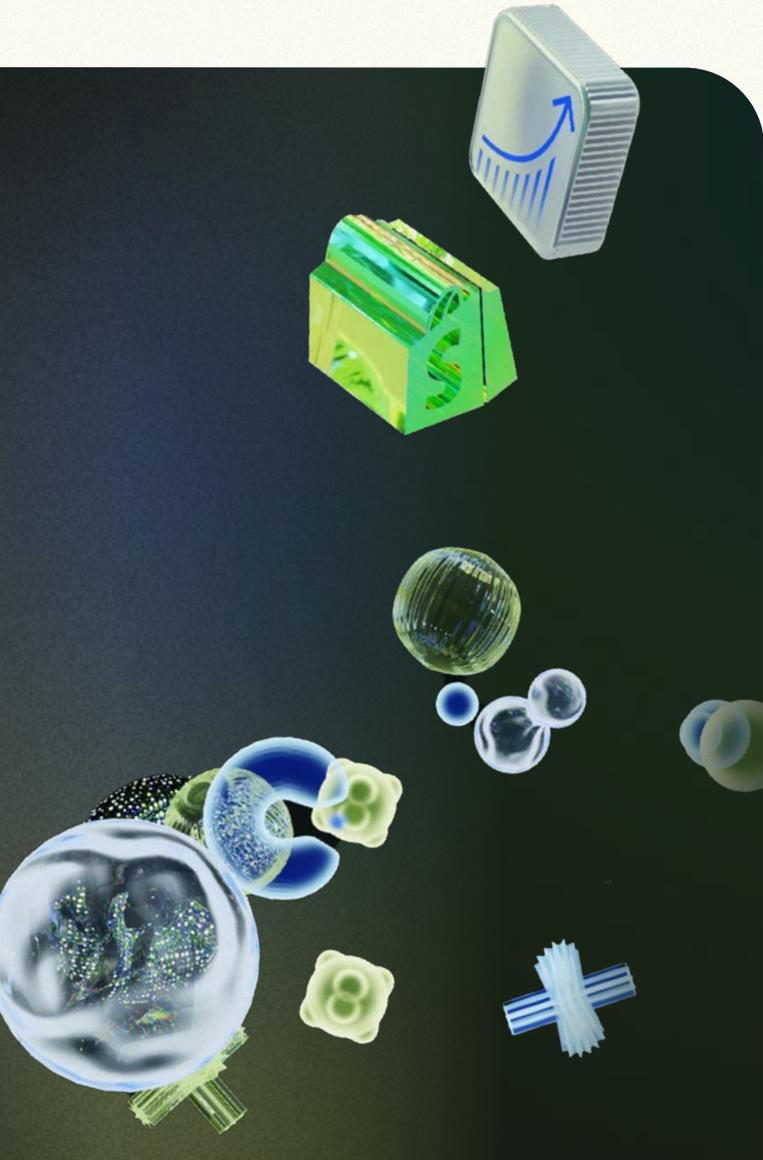
## Return on investment

Many brands we've spoken with who have moved off of custom platforms have said they significantly reduced their expenses—and, because they're able to reallocate their time to growth initiatives, they're often able to grow faster as well.

4

## Increased agility

Developers tasked with maintaining a custom platform are busy enough keeping the lights on. They also have to manage a backlog of requests from business users across the organization who don't have permissions or knowledge they need to make simple updates, which means their ideas can only come to life when engineering has some spare time to help out. Giving business users more autonomy is a huge reason why brands look to migrate off of custom platforms.



# Commerce just works on Shopify

From industry-leading features that keep you ahead of the competition to trading maintenance for value, Shopify has become the platform of choice for brands looking to migrate off of custom platforms.

→ [LEARN MORE ABOUT WHY BRANDS ARE SWITCHING](#)



# The strategic advantages of migrating to Shopify

It's clear that migrating off a custom platform is the right choice for brands like yours today, but migrations are still hard, even when they make sense.

Every migration is unique, especially when you're talking about a completely custom platform, and even "seamless" migrations face a few headwinds that threaten to derail the entire project.

But perhaps one of the biggest factors in the success or failure of a migration is the platform you choose to migrate to.

The migration process for brands who choose Shopify, for example, will benefit from



## **Optionality**

Shopify supports complete migrations from a custom platform to our CMS. Whether you want a full platform migration, headless architecture, or even just the Shop Pay Component (unlocking the internet's best converting checkout), Shopify allows you to replatform in a way that makes the most sense for your unique business needs.

## **Composability**

Shopify is composable by default, meaning you can connect and swap Shopify's native tools with your preferred third party systems. For anything custom that we don't have an integration for, we'll work with you to integrate it into your new tech stack on Shopify.



#### Digital Commerce Built for Breakthrough Brands.

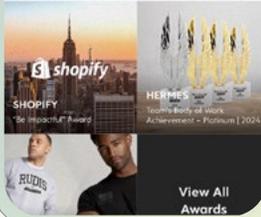
As an award-winning, full-service digital commerce agency, we design retail and B2B experiences and we engineer the technologies to fuel them. Our aim is to design and build truly inspiring eCommerce websites and applications for our clients and their customers. We're a collaborative team of cross-disciplined professionals driven each day by our desire to turn complex challenges into compelling solutions.

**1,000 +**  
SITE LAUNCHES

**100 +**  
TEAM MEMBERS

**29 +**  
YEARS AS A TOP  
AGENCY

**37 +**  
INDUSTRY AWARDS



#### Apps

The Shopify app ecosystem has over 10,000 apps and includes a robust library of solutions designed to make replatforming less daunting, difficult, and expensive.

#### Professional Services

Between our launch and Professional Services teams, we've helped brands transition seamlessly to Shopify and unlock our best-in-class commerce solutions, all while protecting their data, enhancing conversions, and ensuring compliance along the way.

#### Partners

Migrating to Shopify also unlocks access to a vast ecosystem of partners who handle replatforming brands like yours to Shopify every day.



Shopify offers an extensive range of apps and pre-built integrations to streamline migrations, but many brands have unique business rules and requirements that necessitate custom solutions. Shopify's robust APIs and checkout extensibility allow partner agencies to implement middleware for complex data migrations, create features like configurator tools and virtual try-ons, and integrate with custom backend systems and third-party tools. Shopify's flexibility supports brands with a tailored, scalable architecture designed for growth.

**Ryan Donahue,**

Shopify Practice Lead, [CQL](#)

You've spent years building a custom platform that helped the business to achieve some really lofty goals. After investing so much time, sweat equity, financial resources, and headcount to evolve the platform, it's only human nature to wonder if you should just stick with it because it (mostly) works.

But as we've seen over the past few years, thousands of brands have reached even greater heights after switching from their custom platforms to Shopify. While you may not have imagined a day where you weren't running your business on a homegrown solution, Shopify gives you the development flexibility and commerce capabilities you need to eliminate entire cost categories, accelerate growth, and thrive in a new era of commerce.

## Ready to explore a migration from custom platforms to Shopify?

→ GET IN TOUCH

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