Top of Mind
Issues facing technology companies

Get ready: open to sharing means open for business
“Developed economies have deployed the devices, the cloud and high-speed broadband networks necessary to support far faster propagation of disruptive digital technology business models than was ever possible before. The sharing economy is among the first of these models, but far from the last.”

Pat Hyek
Global Technology Industry Leader
EY

“Sharing economy” defined:
The sharing economy comprises new business models empowered by multiple disruptive technologies (i.e., cloud-based collaborative apps riding on high bandwidth, always-on mobile networks and the web) that exploit previously inaccessible information to instantaneously match consumer needs to idle capacity. This creates disruptive economic efficiencies.
“Technology innovation is rapidly changing the competitive landscape in every industry. It’s enabling entrepreneurs, lowering market barriers to entry and giving rise to disruptive new business models like the sharing economy – while also disrupting tax, regulatory and legal codes.”

Channing Flynn
Global Technology Industry Leader
Tax Services
EY

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Sharing economy overview

The sharing economy has unleashed extremely disruptive, technology-enabled business innovation — so far, only in selected industries. In the process, its business models have delighted customers; empowered individual entrepreneurs; rewarded investors; disrupted incumbent businesses; angered existing workforces; and confounded government, tax, legal and regulatory agencies.

Now, the question is not if but when the sharing economy will knock on the next industry’s door as it sweeps across business-to-consumer (B2C) markets and into business-to-business (B2B) sectors. Ultimately, sharing-economy business models may change the very nature and structure of the corporation.

Our research and analysis for this report have convinced us that the potential for the sharing economy to disrupt most industries, globally, is unprecedented.

Real-time markets boost utilization
The model’s value creation comes from making available information that drives up utilization rates — of virtually anything — through real-time, online marketplaces.

Sharing-economy business models create online and mobile platforms for property (asset) owners and service providers to advertise their availability and for customers to purchase the use of those assets and services. They take information that previously was either inaccessible or difficult to find — especially information related to availability and location — and make it very easy to access. It might be information about the availability of a room in your destination city, rent-by-the-hour office space near your afternoon meeting or the nearest car that can take you to the airport.

“The sharing economy shatters the entire logic on which large enterprises are built.”

Paul Brody
Americas Strategy Leader
Technology Sector
Ernst & Young LLP
Customer and societal benefits come with short-term upheaval and disruption
By increasing utilization rates, sharing-economy models dramatically reduce economic inefficiency. Their rapid adoption also demonstrates that they delight customers. And some would say, in the long-term, such skyrocketing productivity can lead to significant benefits for society at large.

Until now, headline-making sharing-economy businesses have mostly focused on consumer services. But commercial and industrial organizations are beginning to adopt the same automated integration processes that power existing consumer-focused sharing-economy models. Imagine factories run by industrial conglomerates worldwide participating in online marketplaces that create easy access to asset and business process availability information, along with a relatively frictionless transaction environment within which to rent the use of those assets or processes. Economic efficiency and productivity would spike, while the pace of innovation would accelerate – again.

Prepare to answer the sharing economy’s knock
Sharing-economy business models have been born into a world wholly unprepared for them. Many existing rules don’t apply – and while many countries’ cultures have rushed to embrace them, others have rejected them. But, ready or not, when a sharing-economy opportunity knocks on your organization’s door – whether you’re a start-up or an incumbent – you’ll need to know how you should answer.

“The rapid adoption that sharing-economy models have so far enjoyed suggests that change will come soon, and fast, to many industries. Now is the time to think through your organization’s strategies, opportunities and tactics.”

Channing Flynn
Global Technology Industry Leader
Tax Services
EY
The sharing economy has led to start-ups with extraordinary valuations, up to US$50 billion or more, and to strikes, riots, new legislation and related criminal trials. All of this is happening because tech-enabled sharing-economy models create large new business and societal opportunities, even as they precipitate disruption and new business challenges and risks.

**Sharing economy opens doors to increased liquidity and new value**

The sharing-economy business models behind both opportunity and disruption are complex, multidimensional and nuanced. But they all share a simple core: they apply the information access and real-time trading attributes of electronic equity exchanges to any asset or service market. Then they layer on information about availability, location and quality (often through user ratings and reviews), and deliver all of that in simple-to-use apps, over wireless networks, to your mobile device. “Sharing-economy marketplaces enable well-informed, instant purchase decisions in a trusted transaction environment, from wherever you are and at any time,” notes Channing Flynn, Global Technology Industry Leader, Tax Services, EY.

Just like equity exchanges, sharing-economy marketplaces increase liquidity in their respective markets. The increased liquidity drives up utilization of existing assets and services, opening doors for those on the provider side of the marketplace to monetize their assets and services to a greater extent than before.

**APIs for IoT and “industrial mash-ups” will knock on many more doors**

Sharing-economy business models make extensive use of application programming interfaces (APIs) that enable simplified access to stored information, automated services or both. APIs enable many sharing-economy businesses to develop rapidly, leveraging information and services provided by others to create new value. “Think about the way ride-hailing and home-sharing apps use location and mapping services,” explains Jeff Liu, Global Technology Industry Leader, Transaction Advisory Services, EY.

While the headline-grabbing sharing-economy services known so far are generally B2C, proliferating APIs are opening B2B doors as well. For example, the internet of things (IoT) is rapidly equipping all manner of physical things (both industrial and consumer) with sensors, networking and APIs that ultimately will enable them to participate in sharing-economy marketplaces, thus unlocking their underutilized capacity. In addition, “Better instrumentation of the physical world has the potential to help businesses understand their risks far better.

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**Opportunity knocks; disruption enters**

The sharing economy has led to start-ups with extraordinary valuations, up to US$50 billion or more, and to strikes, riots, new legislation and related criminal trials. All of this is happening because tech-enabled sharing-economy models create large new business and societal opportunities, even as they precipitate disruption and new business challenges and risks.
And better understanding of risk should lead to a lower cost for risk resilience,” says Paul Brody, Americas Strategy Leader, Technology Sector, Ernst & Young LLP.

Thus, the sharing economy could drive new kinds of dynamic, even automated, business alliances. We anticipate the emergence of industrial mash-ups leveraging new types of APIs that enable simplified, automated access to business processes – perhaps a manufacturing process or an entire factory. “Imagine how factory APIs would stimulate industrial alliances and innovation by simplifying access and experimentation,” says Liu.

Customers experience increased liquidity and market efficiency primarily as improved quality of service, lower prices and instant gratification. But there are more sharing-economy paths to customer delight:

- Sharing-economy marketplaces offer a richer array of options than typically offered by incumbent businesses that achieve operational efficiency via vertical integration of selected choices.
- They are similar to social networks in that they offer people new ways to connect, interact and support each other.
- They often fill in marketplace gaps. In car hailing, for example, some fill a price and service gap between taxis and limousines, and certain developing nations now have extremely low-cost ride-sharing services that fall below taxis in price.

Shifting-economy opportunity knocks
Growing liquidity, asset utilization and market efficiency are all powerful benefits – but they’re very abstract. And factory APIs are still in the future. Here are five already proven, tangible benefits and opportunities that emerge from sharing-economy business models.

1. **Customer delight.** The power of delighted customers cannot be overstated. “The customer’s voice will always carry a lot of weight and customer delight is why the sharing economy is here to stay,” says Pat Hyek, Global Technology Industry Leader, EY.

Impact: customers
Sharing-economy marketplaces delight customers.

Opportunity
Build long-term customer loyalty and win customers away from competitors.

Ask yourself
How do we continuously automate and simplify the customer experience, while expanding choice?

Impact: efficiency
The sharing economy improves asset and service utilization.

Opportunity
Monetize assets owned by others.

Ask yourself
How do we enable individuals, small businesses and incumbent corporations to monetize their assets through our business model?
2. Individual entrepreneurship.

“The sharing economy makes entrepreneurs of us all,” says Brody. Some sharing-economy participants report life-changing experiences. Sharing-economy models empower individual entrepreneurs in the following ways:

- Sharing-economy marketplaces become real-time platforms through which individuals can advertise their services.
- They enable better monetization of an individual’s assets, time or skills.
- They lower market-entry barriers by providing the marketplace and the tools to use it.
- Their rating systems allow those with the most merit to rise to the surface and potentially earn at a higher rate.
- They mirror the evolving future of work, reflecting the Millennial generation’s apparent desire for greater independence and flexibility.

3. New “abstracted” value creation.

Technology providers are often surprised by the unintended uses their products serve once they are released. Sharing-economy models may drive a similar phenomenon throughout other industries too. “Sharing-economy platforms and APIs enable an asset’s value-creation potential to be abstracted, or detached, from the physical thing,” notes Liu. Through this abstraction, capital assets like real estate or factories can be monetized in new ways not necessarily envisioned by their owners. “It separates new value that a thing might offer from its current, or orthodox, value,” Liu says. This abstraction is key to the industrial mash-up opportunities Liu envisions on the horizon.

4. Developing-economy boost.

In developing economies, sharing-economy models may enable first-time access to certain assets for a large portion of the population. “You can envision sharing models being extended to refrigerators and freezers, for example, offsetting the ownership cost for those who can afford them and providing affordable access for many others,” explains Jim Hunter, Asia-Pacific Tax Leader, Ernst & Young Tax Services Ltd. Thus, the benefit of developed-economy conveniences might spread in developing economies more rapidly than previously thought.

“The real uniqueness and popularity of sharing-economy company offerings is the real-time direct connections made between supply and demand – provider and consumer.”

Pat Hyek
Global Technology Industry Leader
EY
“As happened with cloud computing before it, laws on the books don’t currently cover transactions like the ones many sharing-economy businesses enter into. ... In many cases, sharing-economy companies don’t even know whether or not to collect a specific tax.”

Channing Flynn
Global Technology Industry Leader
Tax Services
EY

5. Societal benefits. Sharing-economy models are believed to be better for the environment because they make greater use of existing resources, reducing the need to make more. And increased utilization and efficiency raise productivity, which, in turn, can raise standards of living. “As the utilization of assets and services goes up, the benefits to society are great,” says Brody.

Disruption, challenges and new business risks also emerge
Brody goes on to point out: “But the level of disruption associated with it is also huge.” Sharing-economy models do more than increase market efficiency. They also disrupt by establishing more direct relationships between producers and buyers. That changes the way money flows through the economy, often in ways never anticipated by existing tax, regulatory or legal codes. Following are three types of the most disruptive challenges.

1. Government challenges: tax, regulatory and legal. If much commerce migrates from incumbent market participants to sharing-economy businesses, governments may see revenue flows disrupted before they’re able to enact new rules. “As happened with cloud computing before it, laws on the books don’t currently cover transactions like the ones many sharing-economy businesses enter into,” notes Flynn.

“So who pays a tax becomes an issue. In many cases, sharing-economy companies don’t even know whether or not to collect a specific tax,” he added. This disruption is clear and easy enough to state, but the challenge of resolving it is enormous, requiring new laws and regulations in hundreds — or perhaps thousands — of jurisdictions around the world. It may negate other societal benefits if governments lose tax revenues to fund the services on which their populations depend. In addition, a “meta” question governments must ask is, “How do we want to participate in the sharing economy?” To date, some have embraced it and others have outlawed it. See “Government: welcome committee or gatekeeper?” on page 18.

Impact: access
Proliferating APIs enable automated access to commercial assets and business processes.

Opportunity
Innovate new products and services by integrating assets and services from multiple suppliers (i.e., industrial mash-ups).

Ask yourself
Can we provide simple interfaces to our assets or processes so that others can innovate around them?

Impact: policy
Tax, regulatory and legal policies often don’t apply to sharing-economy business models.

Opportunity
Collaborate with governments to help make certain that appropriate policies are developed.

Ask yourself
How might different policy changes affect our business, and what approach will deliver the best outcome?
2. **Incumbent company and workforce challenges.** Sharing-economy models often disadvantage incumbents in multiple ways, from luring customers away to not having to own the assets they monetize. They are typically simpler and more automated than incumbents. And they create competitors whose regulatory and legal status is unclear and that often are paying less tax as a result. See “Incumbents: opening for sharing-economy business” on page 24.

3. **New business risks.** Sharing-economy models face their own challenges and uncertainties, from the continuous rapid evolution of their own business models to newly enacted tax, regulatory and legal codes – every change of which likely ripples through their business and operating models as well as their IT infrastructures. See “Challenges facing the disrupters at the gates” on page 12.

Optimize your business strategy for a sharing-economy world

Whether your organization is an incumbent technology company, a sharing-economy technology company or an incumbent in any other industry, we believe the time is now to address the potential impact of rapidly rising sharing-economy models. Ultimately, all industries will feel ripple effects, because all assets and services are potential candidates for real-time online and mobile marketplaces. The sooner you start analyzing your organization’s business strategy for a sharing-economy world, the sooner you can optimize it.

“Sharing-economy models are disrupting society, because they change the entire dynamic through which we interact with each other, with commerce, with government and with industries.”

Robert DeMaine
Strategic Analyst
Global Technology Sector
Ernst & Young LLP
“Sharing-economy companies represent one of the true culminations of where technology is going. They bring together mobile phones and apps connected to online marketplaces, with great simplicity, so that whatever your context is at that moment, everything you need is right there and all connected. It’s a perfect model for how we all use our phones and how important that device is in our lives.”

Tara Murphree
Assurance Services and Bay Area Technology Assurance Leader
Ernst & Young LLP

### Impact: society
Increased economic efficiency raises the global standard of living and is good for the environment.

### Opportunity
Strengthen society through business models that build a better working world.

### Ask yourself
How does our business model improve the lives of marketplace participants?

### Impact: workforce
Sharing-economy models cause massive disruption of existing industries and workforces.

### Opportunity
Empower those who have been disrupted to participate in new sharing-economy models.

### Ask yourself
How do we help disrupted workers make a successful transition?
Challenges facing the disrupters at the gates

These are early days in the rise and evolution of sharing-economy business models. Amid all the focus on disruption, it’s easy to overlook the significant and diverse challenges facing sharing-economy companies themselves.

These are start-ups based on new business models whose long-term success requires that they pioneer solutions in multiple dimensions to resolve the many tax, regulatory and legal conundrums their models raise. Pioneers always face hardships. The challenges we identified for sharing-economy companies fall into the following categories:

1. Continuous business model evolution
2. Continuous operating model evolution
3. New business risks and related uncertainty
4. Tension between rapid global growth and local diversity
5. IT development and systems issues, reflecting all of the above

Getting the business model right
Sharing-economy business models are new enough that they still are constantly evolving – mostly in small ways, but sometimes in big ways. It’s a challenge all start-ups share. But for companies simultaneously dealing with new kinds of business risks and uncertainty in their tax, regulatory and legal requirements, each change is magnified and multiplied.

“If sharing-economy companies end up having to make separate cases to every government around the world, it’s really going to affect their ability to do business.”

Ray DePole
Bay Area Tax Market Leader
Ernst & Young LLP
“In the past 12 to 18 months, one sharing-economy company we know had two or three significant business model changes,” notes Jamie Wolfe, International Tax Services, Ernst & Young LLP. The company in question began by offering services on a subscription basis, changed to a per-booking commission system and eventually added a separate service fee. “Each of those changes generates ripple effects across tax, regulatory and legal,” Wolfe explains.

Further, sharing-economy companies often face two questions with far larger business model implications:

- First, who is your real customer, the buyer or the service provider? While your go-to-market plan may answer, “both,” accounting standards require a definitive choice (with implications for revenue recognition as well as tax, regulatory and legal compliance).

- Second, who is and who isn’t an employee? Since sharing-economy companies view themselves as technology firms providing electronic exchanges for transactions between independent service providers and their customers, it makes sense to them that those service providers are not their employees. But it makes less sense to many governments and little or none at all from the point of view of incumbent companies participating in the same markets.

How such questions ultimately are resolved will impact sharing-economy company business and operating models, as well as a whole host of compliance requirements.

“Many sharing-economy companies are driven by a passion about how their models protect and perhaps even improve the environment.”

Jon Cisler
International Tax Services
Ernst & Young LLP

Challenge
Continuous policy and business model evolution.

At issue
Business model changes are magnified by tax, regulatory and legal uncertainties.

Ask yourself
How will possible business model changes interact with evolving policies in the jurisdictions in which we operate?

Challenge
Continuous infrastructure and process evolution.

At issue
Companies must constantly improve automation and integration to stay abreast of ongoing technology innovation.

Ask yourself
What is the operating model that maximizes delight for both customers and asset and service providers?
Continuously evolving an operating model that delights customers and providers
Sharing-economy companies face an additional challenge that drives ongoing operating model evolution: they must continuously streamline processes and automate more and more of them, while integrating new capabilities.

Because of technology’s continuous waves of innovation, sharing-economy companies that don’t continuously improve their automation and integration face disruption by even newer, more efficient start-ups. For example, as convenient as car- and home-sharing services may be, there is still the problem of access – getting the keys into customers’ hands. Networked electronic locks have begun to emerge; they will likely be rapidly integrated into sharing-economy systems, and then their use will be automated to offer customers and providers a seamless, in-app experience.

New risks and uncertainty
No one pays taxes unless governments enact taxes. Likewise, you can’t comply with regulations until they’re written. Many of those outside of sharing-economy companies consider these statements disingenuous. But while some jurisdictions do have laws and regulations that apply to sharing-economy transactions – or have passed them recently – the fact is that many others do not. And for sharing-economy companies, this creates hard-to-assess challenges in the form of potential risk and uncertainty.

Occupancy tax is offered as an illustrative example in our section titled, “Government: welcome committee or gatekeeper?” (see page 18). As noted there, home-sharing marketplaces raise questions about whether the tax is applicable. If so, who owes it? Who should collect it? And how should all of the above be reported?

Given the business risk and uncertainty such open questions engender, sharing-economy companies must decide how to behave in situations where existing rules don’t seem to apply. Their approaches vary widely. Some pursue the most efficient operating model they can envision, making the conscious choice to worry about rules and regulations only after they are enacted – or the organization is sued or its employees arrested. Others are collaborating with officials in jurisdictions where issues arise, sometimes before legal action and sometimes after.

“\nIn the past 12 to 18 months, one sharing-economy company we know had two or three significant business model changes. Each of those changes generates ripple effects across tax, regulatory and legal.”

Jamie Wolfe
International Tax Services
Ernst & Young LLP
Another example illustrates the new kinds of business risk faced by sharing-economy companies: who is liable for property damage in multiparty transactions? One sharing-economy company created a fund to reimburse owners when their property suffers extensive damage — raising the related question of whether that company had therefore become an insurance provider subject to compliance with that industry’s regulations.

**Tension between rapid global growth and local diversity**
Successful sharing-economy companies tend to expand internationally faster than many other companies. An important internationalization challenge is the tension between a single global operating model and fine-tuning local models to account for local rules, norms and more. The global approach gives up potential local opportunity and efficiency in return for global operating efficiency. “The complexity of country-by-country operating models is enormous,” notes Stephen Bates, International Tax Services, Ernst & Young LLP. While the approach may be more tax efficient and less risky, it requires IT systems to be designed separately for each country — among many other complexities. Adds Bates: “As each jurisdiction brings new rules online for the sharing economy, you’ll face an ocean of operating model re-engineering.”

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“Sharing-economy companies have the technology and the marketplaces, but every day they must ask and answer, what is the operating model that enables a delightful end-to-end experience for both the customer and the provider?”

Angela Carter
Market Segment Leader — Bay Area Technology
Ernst & Young LLP

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**Challenge**
New business risks and uncertainty.

**At issue**
Multiparty transactions raise unanswered tax, liability, insurance and licensing questions.

**Ask yourself**
How do we increase our resilience to risks and address gaps from unanticipated changes to tax, regulatory and legal policies?

**Challenge**
Tension between rapid global growth and local diversity.

**At issue**
Companies must seek optimal balance between global and local operating models.

**Ask yourself**
What are the opportunity and cost trade-offs between one global approach and fine-tuning operations for each locale?
Reflecting each change in IT systems
As business and operating models evolve; as risks are addressed; and as governments around the world catch up with the sharing economy by enacting new tax, regulatory and legal codes, virtually every change must be reflected in IT systems and processes. “The challenge is to have enough qualified professionals who understand not only the systems development software side but who also understand the laws well enough to properly reflect changes in the organization's systems,” says Wolfe.

Déjà vu disrupted
While thorny and complex, all five of the sharing-economy challenges we have elaborated also are the most recent iterations of similar challenges faced by innovative technology companies since the industry's inception in the 1950s. EY has experienced each inflection point as advisors to technology companies, beginning with the very first generation that emerged from Silicon Valley to the global technology players of today.

“Sharing-economy companies must carefully consider liability issues and existing regulatory frameworks when setting up their operating model and corporate structure, or they could run into serious issues down the road.”

Dr. Peter Katko
Head of IP/IT/Privacy Law GSA
Ernst & Young Law GmbH
The complexity of country-by-country operating models is enormous. It may be more tax efficient and less risky, but then your IT system has to be designed separately for each country – among many other complexities. Plus, as each jurisdiction brings new rules online for the sharing economy, you’ll face an ocean of operating model re-engineering.”

Stephen Bates
International Tax Services
Ernst & Young LLP

**Challenge**

IT development issues.

**At issue**

Almost every change resulting from the evolution of the sharing economy must be reflected in IT systems.

**Ask yourself**

How do we maximize the flexibility of our IT systems in order to minimize the expense of ongoing changes?
Government: welcome committee or gatekeeper?

Embracing sharing culture – or not
Governments around the world are deciding what kind of innovation economy they want to have as sharing-economy companies enter from other countries and as domestic start-ups launch. Some are making proactive decisions and some are allowing existing rules, regulations and special-interest groups to work it out in court.

Asia-Pacific countries, for example, have generally embraced the model (though Hong Kong is a notable exception). “In Singapore, someone who wants to drive for a ride-sharing app can obtain the necessary license for only SGD40,” notes Alex Postma, Global Director, International Tax Services, Ernst & Young Tax Co. (Japan). Singapore’s Government also has invested in a homegrown ride-sharing start-up, which also received investment from China’s sovereign wealth fund and that country’s own leading ride-sharing company. But not all cultures have embraced sharing. Peter Katko, Head of IP/IT/Privacy Law GSA, Ernst & Young Law GmbH, notes that car sharing is not popular in Germany: “Germans just don’t want to let other people share their cars. In Germany, my car is my castle,” he said. In addition to culture, in some instances, governments are taking a hard-line approach. For example, in France and Hong Kong, drivers for ride-sharing apps have been arrested and company offices raided.

Giving entrepreneurs access to opportunity
“The important issue for countries to think about is the reverse of what most people think. It’s not about making business easier for sharing-economy companies. It’s about giving the entrepreneurs in your country access to opportunity and to growth from customers in other countries,” explains Postma. Two factors are critical to empowering a country’s individual entrepreneurship: clear rules and the bureaucracy’s response to speed. Clear rules around tax, regulatory requirements and legal liability enable citizens to conduct commerce effectively both within and between borders. Speed is a problematic issue when companies used to near-real-time app revisions in response to customer requests find themselves dealing with bureaucracies that take many months to approve an operating license.
Opportunity for developing economies

Governments in developing economies may be particularly motivated to embrace sharing-economy models because asset sharing has the potential to raise their populations’ standard of living. If participants in markets where they have limited access to scarce resources begin sharing assets, those markets may see unique sharing-economy opportunities. “The key obstacle developing economies must overcome is that some areas lack sufficient digital connectivity. It may take years for them to catch up before assets can be put into an online and mobile marketplace,” says Jim Hunter, Asia-Pacific Tax Leader, Ernst & Young Tax Services Ltd.

Revising tax, regulatory and legal codes to recover disrupted revenue streams

Advancing technology makes existing tax, regulatory and legal codes obsolete with increasing frequency as waves of innovation occur more rapidly. This has long been a challenge. Sharing-economy business models magnify the challenge by raising complex questions that any two people—let alone separate jurisdictions—may answer differently. Consequently, uncertainty reigns as tax, regulatory and legal guidance falls behind market activity.

Taxing questions

Sharing-economy business models have magnified the nexus questions that are always raised when transactions occur in virtual online spaces. They have also raised new questions, such as which party is responsible for a given tax and who is and isn’t an employee subject to withholding. The Organisation for Economic Co-operation and Development (OECD) provided new global guidelines for digital economy taxation issues in October 2015, so governments have some base-level guidance in hand as they wrestle with these questions (refers to report on Action 1: Addressing the Tax Challenges of the Digital Economy [the Digital Economy Report]). But the sharing economy is already overtaking the new guidelines. For instance, consider how B2B sharing-economy models could test the OECD’s new provisions for such fundamental tax questions as transfer pricing and the attribution of intellectual property within global value chains.

Challenge

Whether to embrace sharing culture.

At issue

Creating innovation that raises overall standard of living.

Governments must ask

Should nations subsidize and/or promote sharing-economy innovation or block and outlaw it to protect incumbent domestic industries?

Challenge

Access to opportunity.

At issue

Enabling individual entrepreneurs to profit within and across borders.

Governments must ask

How can governmental response be accelerated and tax, regulatory and legal codes clarified to support sharing-economy activity?
“The important issue for countries to think about is the reverse of what most people think. It’s not about making business easier for sharing-economy companies. It’s about giving the entrepreneurs in your country access to opportunity and to growth from customers in other countries.”

Alex Postma
Global Director, International Tax Services
Ernst & Young Tax Co. (Japan)

Nexus questions
These questions are amplified by the multiparty nature of many sharing-economy transactions. Home-sharing services provide an illustrative example: they may have a member living in France who owns property in Canada and rents it to a Mexican resident. “Where is that service taking place? Is it at the property? Is it at the owner’s residence? Is it in Mexico, where the renter entered credit card information and booked the sale? Or is it online somewhere, wherever the marketplace servers or the payment processor is located?” asks Wolfe. It’s likely that every jurisdiction wishes to tax the transaction in some way. Global consensus is needed to avoid confusion and conflict, but that will take time to emerge.

Who pays?
Occupancy tax provides the illustrative example for this issue, but similar concerns apply to value-added and other indirect taxes as well. Occupancy tax is generally the responsibility of a hotel owner. But home-sharing marketplaces don’t own the properties advertised in their marketplaces. And since the property owners don’t necessarily provide all of the services of a hotel, it’s not certain they are subject to occupancy tax. In some jurisdictions, there aren’t any regulations (or forms) for reporting the kind of payments that a home-sharing marketplace makes to a property owner for short-term rentals. So does occupancy tax apply? Who collects it? And how would a jurisdiction know a tax is owed, or how much is owed and who owes it? “It’s a much bigger challenge for government agencies to collect tax from many individual property owners, so they prefer to work with the marketplace,” notes Jon Cisler, International Tax Services, Ernst & Young LLP. But marketplaces ask why they should be subject to tax when all they’re doing is providing a service that connects two people in a transaction.

“Technology is moving fast, and in many cases there are no rules surrounding sharing-economy businesses because that type of business didn’t exist before. It’s not that they’re trying to skirt the rules – it’s that the rules just don’t exist.”

Tracy Benedict
Tax, Global Compliance and Reporting
Ernst & Young LLP
When is an individual entrepreneur an employee?
While some service providers participating in sharing-economy marketplaces do so in small increments between other work and play, some focus on their service as though it were a full-time job. Is it? Not for everyone, clearly; but is it for some and, if so, where is the line? Ride-sharing marketplaces argue that drivers are not employees because they work only when they wish to and are provided no work tools by the marketplaces. But not all jurisdictions – or even all participating drivers – agree, and the question currently is the subject of multiple lawsuits. How it is decided will affect income and withholding tax and may significantly impact sharing-economy business models.

Regulatory questions
Taxation is not the only regulatory conundrum raised by sharing-economy models. Here are four more that government regulators must resolve:

• Are sharing-economy companies ever banks? If so, when? Certain jurisdictions require banking licenses for the multiparty transactions marketplaces often enter into, in which they collect funds from one party, keep a share and then distribute the rest to other parties.

• Are sharing-economy companies ever insurers? If so, when? Some marketplaces have established funds to reimburse owners whose property is damaged as a result of a marketplace transaction. Certain jurisdictions may consider this a regulated insurance activity.

• Who needs a license? Currently, homeowners generally don’t need a license to rent a room in their homes. But hotel and motel operators and property owners who rent for the entire year usually do. Jurisdictions have begun to wrestle with this question in light of new sharing-economy activity; new regulation likely is forthcoming.

• What do you need to report? Many jurisdictions have no regulations to govern reporting of the kinds of payments made to service providers and asset owners in many sharing-economy businesses – the forms don’t even exist. Expect jurisdictions to recognize new and emerging forms of sharing-economy commercial activity with new reporting regulations.

Challenge
Digital wireless infrastructure.

At issue
Enabling developing economies to realize their potential from the sharing economy.

Governments must ask
How can developing nations accelerate deployment of digital infrastructure?

Challenge
Recovering disrupted tax revenue streams.

At issue
Creating new rules for multiparty transactions that may have no equivalent in existing tax codes.

Governments must ask
How should new nexus, payor, and employee and contractor questions be answered?

“To advance beyond disruption will require much more collaboration between governments and sharing-economy companies about how, and who, pays for certain societal costs, such as health care, other social services and the tax revenue normally associated with employees.”

Pat Hyek
Global Technology Industry Leader
EY
Legal questions
Beyond taxation, three concerns merit particular attention as legal issues:
1. Liability: to what extent is the sharing platform liable for property damage or injury? The technology company whose online marketplace connects owners and renters has no presence at the damaged property. But the parties are brought together through marketplace transactions. "The extent to which a sharing platform is liable in multiparty transactions is a question that first rose to prominence in the context of home-sharing marketplaces, but it can be extrapolated to any platform that connects service providers with customers," Katko says.

2. Privacy: what are sharing-economy users’ privacy rights? Extensive data is collected on the activity of cars used in ride-sharing services, for example. How might that data be used relative to the privacy rights of service users? Certain jurisdictions take widely disparate views of privacy questions – particularly the US and Europe. Privacy could become a contentious issue for many sharing-economy businesses.

3. New legislation: laws targeting sharing-economy models have begun to emerge. In fact, two executives of a sharing-economy company face criminal trial in France for continuing to operate a service after it was outlawed by new legislation.

“There could be sharing-economy opportunities in developing markets that won’t exist in other markets because there may be a willingness to share an even greater array of assets and more incentive to mobilize resources than in some developed economies.”

Jim Hunter
Asia-Pacific Tax Leader
Ernst & Young Tax Services Ltd.
There is good news
The good news is that because sharing-economy marketplaces are online businesses, compliance could eventually become very straightforward once clear rules are established. “Digital economies are not cash economies; they have electronic trails,” notes Brody. “We know all the participants, and we know where everything happens, so collection of taxes and compliance with regulation can be built right into the system.”

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Paul Brody
Americas Strategy Leader
Technology Sector
Ernst & Young LLP

Challenge
Regulatory and legal uncertainty.

At issue
Enabling confidence in sharing-economy businesses.

Governments must ask
How can the regulatory and legal requirements demanded of all businesses be clarified for the sharing economy?
Incumbents: opening for sharing-economy business

The insight that, in the long run, society will be better off and the world’s standard of living will rise as a result of the sharing economy’s improved utilization of capacity is little comfort to the disrupted.

And we anticipate massive disruption.

To understand the potential disruption faced by incumbent companies, consider the automobile industry. Personal cars are used, on average, only 4% of the day. A taxicab in New York City averages 50% utilization. “If ride-sharing services are able to halve the difference and raise the average car’s utilization rate to roughly 30%, that would be eight times the current utilization of cars – and would represent a 75% to 80% reduction in the number of new cars we need. That’s massively disruptive,” says Brody. Similarly, in the US, office space is used only 30% of the time and 20% of all trucks ride empty, while those that aren’t average only 75% full. “We don’t use assets very well in the real world. Like a receding ocean tide showing us what’s hiding below the surface, instrumenting the global economy will reveal how much unused capacity there really is and where we can find it,” notes Brody.

Consequently, sharing-economy businesses have emerged to create real-time on-demand marketplaces for office space and truck transport – and just about anything else anyone can imagine, from massage therapists to package delivery to personal errands. In the near future, we expect the sharing-economy model of real-time automated access through APIs to proliferate in industrial markets, leading to the industrial mash-ups discussed earlier – which will accelerate B2B innovation and create further disruption.

What’s an incumbent to do?

Developing business strategy in a sharing-economy world

The big mistake made by most incumbent organizations is underestimating the disruption. We believe companies asking themselves, “What is our sharing-economy strategy?” may be headed down a poor path. A better question is, “What is our business strategy in a sharing-economy world?”

“Incumbent companies will be in a constant state of transformation for many years as their customers begin to experience sharing-economy business models, and those experiences stimulate new and changed customer expectations for all
market participants,” says Hyek. Incumbents in slower-moving industries with relatively static business models haven’t yet experienced the continuously fast-evolving business strategies that first emerged in the technology industry and more recently have migrated to other industries as those industries become increasingly technology enabled. As mechanisms to listen for, and act on, fast-changing customer demands and expectations will become a critical element of ongoing success. This means dealing with constant business innovation.

Leveraging incumbent advantages
Identifying and exploiting the differentiating advantages of asset ownership will also be key for incumbents that own assets.

Obvious advantages of the traditional asset-heavy approach include the ability to establish consistent customer experiences that build trust. In addition, incumbent company models may have advantages in terms of security and reliability. Incumbent companies typically have better-established brands that often reflect some or all of these attributes.

Participate in the sharing economy, including through M&A
Perhaps most important to an incumbent’s ability to develop business strategy in a sharing-economy world is to participate in sharing-economy businesses right away. Ford Motor Company, BMW and Daimler have all launched car-sharing services. Small incumbent hotel companies have begun advertising available inventory in home-sharing marketplaces. The opportunity is to learn by direct experience — one reason why the CEO of a car-sharing company also drives for that company.

Likewise, the value of M&A as a path to sharing-economy participation should be explored fully. “The right M&A strategy for an incumbent organization might be to acquire technology that adds an online-and-mobile marketplace for your own inventory. Or it might be acquisition of a sharing-economy competitor, so that you go to market with offerings on both the asset-light and asset-heavy sides of the market,” notes Liu.

“The key question for incumbents is not, what’s your sharing-economy strategy? It’s, what’s your business strategy in a sharing-economy world?”

Paul Brody
Americas Strategy Leader
Technology Sector
Ernst & Young LLP

Challenge
Reimagining business strategies.

At issue
Asset-heavy incumbents competing with asset-light business models.

Ask yourself
How can we automate, simplify and add customer choice, while highlighting the differentiable values our brand offers?

Challenge
Reduction in demand for replacement products.

At issue
Increasing utilization of existing assets is likely to reduce long-term demand.

Ask yourself
How do we assess, and respond to, the true impact of sharing-economy business models on long-term demand in our industry?
“Incumbent companies will be in a constant state of transformation for many years as their customers begin to experience sharing-economy business models, and those experiences stimulate new and changed customer expectations for all market participants.”

Pat Hyek
Global Technology Industry Leader
EY

The future of the corporation: the biggest disruption of all
Just like when scientists broke open atoms to discover they weren’t the basic unit of matter after all, the rise of sharing-economy models suggests that the modern large corporation may not be the basic unit of future commerce.

“The sharing economy shatters the entire logic on which large enterprises are built,” says Brody. Through APIs that enable automated process integration by disparate parties, sharing-economy companies are disputing one of the core premises of modern corporations: that integration is best done within a corporate structure to most efficiently organize people and get them to agree on and manage processes.

Replacing the vertically integrated enterprise
Sharing-economy models replace vertically integrated corporate structures with API-based integration and automation. For example, ride-sharing companies demonstrate that you can run a high-quality, reliable taxi service just as well (or better) than a vertically integrated, taxi-owning enterprise — without owning a single taxi.

“If the integration APIs and automation technology that underpin the sharing economy show that online integration built up in days or months can allow you to match the performance of companies built up over decades, what is the value proposition of large enterprises?” asks Brody.

Industrial mash-ups emerge
It is possible to envision a future in which new companies emerge by tying together services from large networks of suppliers and customers to create new and more agile products and services. In such a vision, the basic unit of commerce may evolve into discrete factories and business processes built on the specialist talents and insights of teams focused entirely on that element. APIs would proliferate across such industrial uses, enabling the automation of access to the process as well as integration of the process with other processes – all of which leads to the emergence of the industrial mash-ups envisioned by Liu. We see this vision as a large opportunity for new kinds of value creation based on bringing together multiple pieces, leading to a dramatic change in the way businesses and consumers access information and, therefore, in the way we see the world around us.

Labor, disrupted: new solutions may emerge, while old ones are revisited
In the debate over whether certain sharing-economy asset and service providers are employees or independent contractors, many observers agree both sides have some merit. However the question is resolved, it reflects a sign of the times: the nature of work itself is undergoing transformation.

The breadth of this transformation can be seen, in part, in the growing call for the question to be resolved by adding a new category of worker: dependent contractors.9 The category already exists in Germany and Canada, where dependent contractors get more protections than freelancers but are still distinct from full-time employees.9 The main distinction is that dependent contractors have much more freedom than employees in certain dimensions, but the employer still has much control over the working relationship.

Another aspect of the sharing-economy-driven transformation of work is that some analysts anticipate the re-emergence of old-fashioned guilds that cross-verify and authenticate the reputations of professionals in their respective communities.10 Such independent forms of validation for individuals’ professional reputations may be necessary to prevent dependent contractors’ reputations from becoming dependent upon a given sharing-economy platform.
“The right M&A strategy for an incumbent organization might be to acquire technology that adds an online and mobile marketplace for your own inventory. Or it might be acquisition of a sharing-economy competitor, so that you go to market with offerings on both the asset-light and asset-heavy sides of the market.”

Jeff Liu
Global Technology Industry Leader
Transaction Advisory Services
EY
We’ve been here before

This report presents our view that the sharing economy has unprecedented potential to disrupt the global economy – and equally unprecedented potential to generate global economic growth and societal benefit.

It is among the first new tech-enabled business models to fully exploit the modern world’s high-bandwidth digital wireless networks that link together large cloud data centers with the billions of powerful mobile devices in all of our hands. But it sure won’t be the last such model.

We know because, surprising as it may sound, we’ve been here before. Ever since the early 1960s, when we began working with the first semiconductor companies emerging in “The Valley of Heart’s Delight” (later known as Silicon Valley), we’ve seen wave after wave of innovative technology disrupt powerful industries and confound tax, regulatory and legal codes.

From the beginning, we helped tech companies, relevant government agencies and other market participants pioneer new rules for emerging technology paradigms that impact business process, tax, accounting and other systems. By connecting the various parties, with transparency around common goals, we helped develop road maps for new regulations, new approaches to taxation and legal codes, and new business strategies and operating models.

Based on our 50+ years of disruptive technology experience, the following pages provide four perspectives on the same burning question: what is most important for technology companies to do or think about when a sharing-economy opportunity knocks?
The level of disruption about to come from the sharing economy truly is unprecedented.

The reason is simple: developed economies have deployed the powerful mobile devices, the high-speed networks and the cloud infrastructure necessary to support far faster propagation of disruptive digital technology business models than was possible before. The sharing economy is among the first such digital business models to combine those technology elements into a universal disrupter of virtually all industries — there will be others. What’s most important about sharing-economy companies is that they have the opportunity to broaden global access to new markets, thereby empowering subsequent generations of entrepreneurs. These companies represent the first of many waves of digital technology business model disruption, and, as such, have an opportunity to set the tone and establish examples that help others enjoy the benefits of such disruptions without worsening the digital divide. Today, many sharing-economy companies are attempting to do just that. They’re building out thoughtful business models for each unique market, demonstrating a willingness to deal with regulation, with tax, with labor unions or whatever critical element of society they anticipate disrupting. They recognize that if they don’t approach their business this way, eventually they will find themselves forced to react, without a plan, in suddenly very difficult and likely unforgiving situations. On the other hand, by taking a collaborative approach and seeking common ground, they are helping usher in an entrepreneurial era with the potential to deliver significant benefits to society at large.

Getting past the current disruption demands far more collaboration between market participants and governments to build common ground around solutions for the tax, regulatory and legal disruptions caused by sharing-economy business models.

That’s what most sharing-economy companies want. Clearly, companies would prefer less regulation and less tax because it makes their lives easier and their consumers happier. But mostly they want to work with governments, find fair and equitable solutions and execute them. And they especially don’t want to be brought before government bodies and accused of tax avoidance or being tax negligent — or even brought up on criminal charges, as we’ve seen happen. To be confident in their digital future, sharing-economy companies and the enterprises that follow them must stay informed by engaging early with regulators and by inviting tax to their strategic planning tables. Working collaboratively is what moves us past the disruption stage so the benefits of sharing-economy models can spread throughout society.
I've worked on corporate transactions all of my professional life, so what fascinates me most about the rise of the sharing economy is what I believe will be a very large impact on future transactions.

When you look under the covers at the technology-enabling sharing-economy models, you see an evolving capability to separate business functions that until now have always been integrated into a monolithic organization. This technology enables you to abstract away a business function from the physical assets and people who provide that function. That abstraction is what leads me to the idea I call industrial mash-ups, which would enable those outside your organization to imagine and create new business value by innovating on and around the business functions that your organization presents to the world via sharing-economy-style interfaces. These would be new kinds of transactions, partnerships and alliances, which could form, live and die very dynamically – because these new interfaces to business functions help drain the friction out of fast-evolving business relationships.

I personally believe that there are massive, massive levels of disruption coming.

As EY's analysis suggests, the sharing economy is rapidly leading to a kind of API-based economy that enables automated integration of anything that anyone can imagine. And many of those words demand emphasis; once assets, services and business functions are abstracted into APIs, anything can become available to anyone to incorporate into their value-creation equation. But the sharing economy is actually growing slowly right now compared with its actual potential, because it is still relatively clumsy and complicated, and companies face tremendous uncertainty and risk. What's required to drive this asset utilization economy faster is far better automation of the process – embedding into software interfaces the functions that people are still performing today, like getting keys to a room or a car to a customer. And then two other major things are needed: simplification, by integrating multiple steps of the process into one, and clarification of all the associated legal risks and liabilities, tax and regulatory codes, as Pat and Channing have noted.
When the sharing economy knocks, how will you answer?

Sources

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