The New York Times

Taxpayers for U.S. Chips

By Shira Ovide

August 10, 2022

The United States has authorized \$280 billion in taxpayer money to subsidize rich computer chip companies and invest in technology research for the sake of keeping America strong and innovative.

President Biden on Tuesday <u>signed</u> the law, officially known as the CHIPS and Science Act of 2022, calling it "an investment in America itself."

If this law does what its many backers in government and private industry hope, the U.S. will have more control over the future of essential computer chips and have a hedge if China grows more hostile toward Taiwan, a U.S. ally. The law also aims to keep America on the cutting edge of technology by putting more government support into research.

Here is why the law exists and what it could, and could not, do to help America:

The dream of U.S.-made chips:

The law authorizes more than \$52 billion to help companies pay for building or expanding American computer chip factories and for research and worker training. In short, American taxpayers are paying computer chip companies to make their products here and not in, say, Germany or South Korea.

Why? U.S. officials are worried that a relatively small percentage of the world's computer chips are manufactured in the United States, and that it includes virtually none of the most sophisticated chips used in military equipment and smartphones.

The first concern is not necessarily valid. Lots of computer chips are basic like those used for the computer memory or brains in appliances, and the U.S. probably doesn't need to make more of those. Manufacturing of many consumer goods like T-shirts and TV sets are outsourced to other countries.

But for two big reasons, backers of the law say that the U.S. should use government money to make it financially worthwhile for both American and foreign corporations to make more computer chips stateside.

First, advocates say that it's important for America to <u>preserve expertise</u> in designing and building advanced computer chips. We don't have the same national interest in maintaining T-shirt know-how. Building computer chip factories costs a ton, and it's more expensive in the U.S. in comparison to other countries, partly because of subsidies provided by other governments. This new law will enable the U.S. to help level the playing field.

The second reason is the potential vulnerability of Taiwan, home to Taiwan Semiconductor Manufacturing Company, which makes build-to-order chips for many companies including Apple. If you have a smartphone or shop online, chips made by T.S.M.C. are probably involved. If China continues to escalate its military confrontations with Taiwan, the supply of most of the world's advanced computer chips could be at risk.

Supporting a little more chip production in the U.S. most likely won't make much of a dent on T.S.M.C.'s hold on the more advanced chips. America's small market share of advanced computer chip manufacturing is partly the result of the <u>struggles</u> of the country's leading chip maker, Intel. A government bill won't change that.

Inflation F.A.Q.

What is inflation? Inflation is a <u>loss of purchasing power over time</u>, meaning your dollar will not go as far tomorrow as it did today. It is typically expressed as the annual change in prices for everyday goods and services such as food, furniture, apparel, transportation and toys.

What causes inflation? It can be the result of rising consumer demand. But inflation can also rise and fall based on developments that have little to do with economic conditions, such as <u>limited oil production</u> and <u>supply chain problems</u>.

Is inflation bad? It depends on the circumstances. Fast price increases spell trouble, but moderate price gains can lead to higher wages and job growth.

How does inflation affect the poor? Inflation can be especially hard to shoulder for poor households because they spend a bigger chunk of their budgets on necessities like food, housing and gas.

Can inflation affect the stock market? Rapid inflation typically spells trouble for stocks. Financial assets in general have <u>historically fared badly during inflation booms</u>, while tangible assets like houses have held their value better.

But more executives and government officials believe that the benefits of encouraging more chip production in America are worth the risks of wasting money with taxpayer handouts to chip companies.

Most of the law is about basic research — for better or for worse.

There is about \$200 billion for programs aimed at American invention.

Cash is flowing to create 20 regional technology centers for developments backed by the government in areas such as chips, energy technologies and biotechnology. Taxpayer money is sprinkled to other government agencies to train Americans for next-generation jobs and for scientific and technical research that doesn't have an immediate payoff.

The Wall Street Journal editorial board recently <u>described</u> this part of the law as a wasteful expansion of the federal bureaucracy and a likely fruitless partnership of government and large industries.

That could be true, although there is a long history of the government being <u>essential to American innovation</u>. We might not have computer chips, the internet or <u>Covid-19 vaccines</u> without collaborations between big government and big business. Of course, more government spending doesn't necessarily translate into more innovation, as China is <u>finding with its own government-backed computer chip initiative.</u>

What this law won't do.

Despite what some corporate executives and public officials have said, putting government money into computer chips most likely <u>won't solve</u> shortages of products like cars.

Auto manufacturers have struggled to make as many vehicles as Americans want to buy. That's in part because they can't buy enough chips for features like navigation and braking systems. But building more chips in America won't fix that. This problem was caused by a surge in consumer spending on physical products, factory shutdowns related to the coronavirus and manufacturers' failures to adapt to the new realities.

Understand Inflation and How It Affects You

- **Inflation 101:** What's driving inflation in the United States? What can slow the rapid price gains? <u>Here's what to know.</u>
- **Inflation Calculator:** How you experience inflation can vary greatly depending on your spending habits. <u>Answer these seven questions to estimate your personal inflation rate</u>.
- Managing Your Finances: With interest rates rising, now is a good time to <u>pay down</u> <u>credit card balances and bolster emergency savings</u>.
- Cost of Living: As food prices rise, <u>eating is becoming increasingly expensive</u>. We took a close look at <u>five New Yorkers' food and drink habits</u> to see where the effects are most felt

Scott Lincicome, an economist at the Cato Institute, a libertarian think tank, gave me infant formula as an example. American factories make nearly all of the baby formula consumed in this

country. That didn't prevent — and might have contributed to — the <u>bare store shelves of formula</u> in the U.S. this year.

Some computer chip companies and <u>lawmakers</u> have also recently <u>stressed</u> that expanding chip manufacturing in the United States will create more high-paying jobs. Economists have long <u>cautioned</u> about the effectiveness of the public helping to pay for jobs in some industries.

Like the <u>climate</u>, tax and health care <u>bill</u> that Congress is expected to pass this week, the chips law is ambitious and may not show its merits for many years. But at a time when the federal government is stuck on many national priorities, elected officials actually did something in chips that may prove momentous.

Before we go ...

- A former Twitter employee is convicted of helping the Saudi government: My colleagues Kalley Huang and Kate Conger <u>reported</u> that a jury convicted the former employee of charges related to handing over the private information of dissidents to Saudi officials in return for money and a luxury watch.
- The app that's too important to block: Russia's government doesn't like that YouTube gives its people access to unvarnished views of the war in Ukraine. But The Wall Street Journal reports that Russia is worried that blocking YouTube, as it has with other sites such as Facebook, will provoke a public backlash. (A subscription is required.)
- **Tourism with a political motive:** Some people who have an online following making travel videos are going to Syria to create videos that gloss over the country's brutal civil war and that burnish the Syrian regime's reputation, The Washington Post reported. (A subscription may be required.)

Hugs to this

This cat doesn't care what the rules are. It will sit on the freezer case.