‘WHY DID YOU WANT TO BE A PART OF THE TEDX TEAM?’ – TEDXUOFW TEAM

DAISY SCHREIBER: I wanted to be a part of the TEDx team because I think people talking about the stuff they care about the most in the world is awesome. We should all listen to more people, who, you know, have really cool stuff to say.

SARAH SCHMITZ: I joined the TEDx team because I believe that there are so many ideas worth spreading and everyone else on the team also thinks that.

ISHMEET SINGH: I joined TEDxUofW and decided to help because I wanted to be a part of something that was much bigger than me and work with really inspiring people. From a young age, I’ve always TED talks and this was a great opportunity for me to give back to the community and be able to really show others how inspirational this event is.

JACQUELINE HUNTER: I joined the TEDx team because I was super inspired by the amazing speakers, the wisdom and perspective they had to share, and I also took it as an opportunity to improve my own writing skills on the speaker selection team through developing the talks themselves.

JESSICA PRASETYO: What interested me about TEDxUofW was that, as a designer, people will interact with my work and my designs in a way that is meant to be in real time and in real life. So that was an aspect, especially with COVID, that was truly interesting for me. Especially considering this is an online community and everything had turned to the internet.

NINI TSENG: So, back to my high school life, I was also in the TEDx team at my school. And so, during the time, I received inspiration from the different kinds of speakers and I also learned how to cooperate at work with different kinds of teammates. So, for me, I think TEDx is a really big family where you can laugh and have fun. At the same time, you can also learn a lot of things from diverse communities.

SAMANTHA FREEMAN: This is my third year being on the TEDx team. I wanted to join the team again because I love and support TED’s mission, I feel inspired by the people around me, and I’ve made many wonderful friends.

VARUNA RAVI: Alright, this is literally going to sound fake. I swear it's not, but it's going to sound fake. I used to have this weird TEDx obsession. Okay, why do I say "used to"? I still kind of have a weird TEDx obsession where I watch TED talks… for a long time. It's kind of self-explanatory.

AIKO BEAUCHAMP: I wanted to join the UW's TEDx team not only because I get to be a part of creating something, but because I get to be a part of creating something where multiple people's ideas can be shared and stories can be told to other people, and I think that's awesome.

ALEJANDRO GONZALEZ: After watching so many videos on YouTube, just all of the videos they have, I just wanted to help in the process and make more.

YOUJEAN CHO: Being a part of TEDxUofW seemed like a fun way to get involved in the UW community. I found it very appealing that it had a very broad audience and it involved stories from outside my scope of interests.

EMELIA HUGHES: The reason I wanted to be involved in TEDx is because it's such a cool community of people who bring a platform to a lot of narratives and stories that we maybe don't get to hear about as often in the mainstream media. So, I think TEDx is such a great opportunity for us to hear about important issues in this world and shine a light on stories and narratives on people who don't get to share as often.

RAHUL PRASAD: Welcome back! We are now in the second half of the TEDxUofW conference. I hope that you've enjoyed the first five speakers of our conference and had the opportunity to interact with us in our live Q+A on Instagram at @TEDxUofW.

> Before we get back into it, I want to take this opportunity to thank our event sponsors once again. TEDxUofW 2021: Meanwhile is presented by WSECU and is co-sponsored by The HUB, Wells Fargo, and the University of Washington Alumni Association.
>
> Now, let's get back into it. We've got five amazing speakers and two performances still for you to see.

Our fifth speaker, Casey Dreier, is the Chief Advocate and Senior Space Policy Adviser for The Planetary Society, the world's largest independent pro-space organization led by Bill Nye.

He is a trusted source for journalists on the topic of space exploration and has been featured in many publications, including The New York Times and The Washington Post. Casey is also co-host of the podcast Planetary Radio: Space Policy Edition, which has been broadcast monthly since 2016. Please welcome Casey Dreier.

'THE SPACE RACE IN YOUR OWN BACKYARD' – CASEY DREIER

CASEY DREIER: 50 years ago the United States won the first space race for the third time.

That's when Apollo 14 made the third successful landing on the Moon, in January. Later that same year, the United States would land for the fourth time with Apollo 15.

Like the majority of people alive today, I was born after the first space race. For me, the Apollo program was history, almost a myth—a magnificent story that had already happened. A story that, today, most people were not and can not be a part of. I feel like I had missed something.

But something is happening around us, right now. Literally here, around us. There's another space race and this time it's in our own backyard, and we can all be a part of it.

This race isn't between political superpowers, but between private organizations. Not between nations but between states and localities.

And while it won't be on the scale of the first space race, the outcome could have longer lasting consequences.

The first space race is almost inconceivable in scale to those of us who didn't live through it.

In less than a decade, the United States went from launching a single astronaut on a 15-minute up and down ride to multi-week sojourns to the surface of the Moon and back. To achieve this, the country spent the equivalent of a quarter of a trillion dollars and engaged nearly 400,000 workers at its peak, something like

2% of the country's entire workforce. This is a speed and scale of resource deployment rarely seen outside of warfare.

The first space race happened as a result of a unique global ideological confrontation between the Soviet Union and the United States. It occurred during a period of European decolonization, when dozens of countries were becoming newly independent, and able to chose their methods of government for the first time.

Space exploration is a symbol—a symbol of technological prowess, organizational capability, and material might. Because space is so unforgiving, so harsh, so unearthly, and so new it served as a perfect symbol of power.

Both the Soviet Union and the United States used space exploration as a symbol to demonstrate their respective strengths. And it worked! Global public opinion would change after big space firsts, like the first man into space, as to which nation was more technologically advanced.

So to win this competition for the hearts and minds of the globe, and to encourage these peoples to chose its preferred method of governance, the United States decided to race to the Moon—because it was hard. Being first to the moon was the ultimate symbol—everyone is familiar with the Moon, everyone knew no one had gone there.—and the U.S. focused its energy as if its global reputation was on the line. And it worked. By the end of the space race the US was seen as the leading technological power in the world.

But as rapidly as the race began, it ended. After 6 landings by the United State, the program was abandoned. And since 1972 no one—not the U.S., not the Soviet Union, not any other country—has even attempted to send humans anywhere beyond Earth orbit. The first space race was, in a sense, self-negating. Once it was "won" there was nothing left to do in how it was defined.

This isn't to say that space exploration stopped after Apollo. It changed.

Political support for rapid, ambitious feats of human exploration disappeared. In its place, the two superpowers relegated their astronauts and cosmonauts to the much more accessible Earth orbit, building space stations and space shuttle. Robotic spacecraft became the true pioneers of space: visiting every major body in our solar system and reaching interstellar space.

This type of space exploration no longer is warfare by another means, but carries lofty goals of curiosity, exploration, and scientific understanding of our natural cosmos. Its the better angels of our nature made manifest.

This new space race is something different all together. It's a race to establish the start of something—not a race to a completion. It will be self-reinforcing instead of self-negating.

It is a race to dominate access to space. No longer by nations, but by private organizations

This access comes in many forms: launch vehicles to take things into space, spacecraft to sustain life or provide services in space, communications networks and other space infrastructure. Even new space stations and settlements in the long term.

Unlike the first space race, the current space race is not happening among nations, but private organizations. These are companies like SpaceX and Blue Origin and Rocket Labs and Virgin Galactic.

Since 2011, venture capital investments increased to $15 billion, from $1 billion. Jeff Bezos now spends over a billion dollars a year on his company, Blue Origin, which makes it larger than many national space agencies around the world.

Because these companies exist outside of government, they are less subject to the political whims and currents that put an end to the first space race. Absent democratic oversight, these companies can focus better on long-term, singular idiosyncratic goals under the direction and personal interest of their founders and CEOs.

But they are highly motivated to race to become the dominate provider in their area of expertise, much like Amazon has dominated ecommerce, Google search, and Uber and DoorDash are trying to do with ridesharing and delivery. The faster you can grow, the harder it is for competition to overtake you.

The outcomes of this race will define the future of space for both exploration and its economy by because the people who get there first end up defining its culture and ethos of what you do when you get there.

It's also happening in places not classically associated with the space program, particularly places that have created large amounts of wealth from tech: Washington and Northern California. So if you live here near the University of Washington, there's a space race happening in your own back yard.

More than 6,000 people work in our space sector, which contributes nearly $2 billion per year to the state's economy. Out universities contribute to the design and operation of orbiting Earth satellites, Mars rovers, and space telescopes. Washington companies helped land NASA's latest rover and helped build the first helicopter on the red planet. They are working on new forms of propulsion and rocketry. There are dozens, if not hundreds, of new startups aiming to service the nascent commercial space sector.

Washington inherited industry through the unlikely joint lineage of its commercial aviation and technology industries, combining a highly-skilled engineering workforce with the deep-pocketed, do-it-yourself attitudes of the modern tech.

But that doesn't mean it will stay there.

Working concurrently is a race between states to attract and retain these companies. Classic space states of Texas, Alabama, and Florida are investing heavily to lure new companies—providing tax incentives, friendly regulations, and ample space to build and test hardware.

The future of an industry is highly sensitive to its initial conditions. The old space states of today owe their existence to the investments made by Apollo more than 50 years ago. They see the value of capture the future of the industry, now, even if the payoff won't be for decades.

So Washington is in a race of its own, and it doesn't even know it.

This is a profound shift that has no historical precedent.

What is being created here is independent access to space not mediated through government. That means that organizations can send whatever—and whomever—they want into orbit and beyond. They can launch their own global communications systems. They can launch commercial satellites, government payloads, advertisements, stunts, or cars.

They will be the ones mediating our relationship with cosmos.

This has profound implications, from abstract questions of ownership of celestial bodies to the view of our night sky. As I speak, tens of thousands of satellites are planned to paper over our skies that will change our view of the cosmos for decades to come.

Government-led space exploration, ultimately, serves the national interest. In democracies, it is the function of public oversight and the expenditure of public funds.

For this new space race, the private organizations have far more leeway in operations and values they will extend on our behalf. Many, if not most of them depend on government funding to some degree. But they have far less oversight than traditional space agencies. As long as they operate within the bounds of the law, they can serve any interest they choose.

But the really interesting thing about this new space race—the rush to capture new markets—is the part that has me most excited: this isn't a story we're telling about the past. It's happening around us. The ending is unwritten.

You can help shape it by training to be an engineer or scientist. But that has always been the case. But now you can also be an entrepreneur. A political scientist. A strategic consultant. Advertising. Social media. You can join or create a new entrant into this emerging market and bring your values, your energy, and your passion—no Ph.D. needed.

We can also take more active steps as citizens and begin asking our state and federal government to use its buying power, taxing abilities, and regulatory responsibilities to support organizations that reflect your values. We can apply lessons of the past and ensure that growing industries respect the natural world and the people who live within it.

We can do this by encouraging companies to make their home in Washington. Locations impart their cultures on industries just as industries impart their culture to their neighbors. We are not guaranteed to be a space state, but we should aim to make it one. We can take active, progressive steps to retain and create forward-looking industries. To create an epicenter of industry and science.

We have an opportunity, now, to help shape this future. To set these initial conditions that will echo down for generations.

We have the opportunity to define how we look to people 50 years in the future. We won't be remember for having people on the Moon, but perhaps we will be remembered for helping to create the future that does, for the future that brings everyone along with them.

The first space race didn't last, the second one could start something to last indefinitely.

We have an opportunity to be a major part of that new story in space.