Internet Iceberg & Dark Web Dangers

CyberAware Podcast: Season 2, Episode 3

Nathan: All right, everybody. Welcome back to the cyberaware podcast, episode three. And for today's episode, we got a pretty interesting topic that I'm excited to talk about. My name's Nathan, I'm your resident expert for all things cybersecurity. And I'm here joined with Ham.

Ham: Ham, once again, on the mic as always here in the broadcasting room.

Nathan: Today's episode is the internet iceberg. So Ham, what do you know about the internet iceberg?

Ham: Well, I know that, using the iceberg analogy, it really, it can go as deep as it wants to go.

You know, so you got the surface web, got stuff like Amazon, YouTube, Facebook, all those, you know, big companies that are just out there ready for it. Ready to be accessed. And then you got the deep web, right? Nothing super crazy, but you got your data's stored there and all that stuff.

And then you got the dark web.

Nathan: Correct.

Ham: The dark web is a dark scary place. I never want to go back to.

Nathan: Okay. So for anyone who's just curious about the iceberg analogy here, you think of an iceberg, you see the surface above it, but then icebergs are with so massive underneath. No one truly knows the scale. Surface web, I believe is what maybe 5% compared to the like 90, 90, some percent. Consists of the dark web and deep web.

You can think of all the websites that you can find on surface web. Oh yeah. And it is a fraction of what you can find elsewhere. So the iceberg analogy is, you have everything above the surface and it's just, it looks big, but it's actually tiny compared to everything that's underneath and the deeper you go, the bigger gets or the more stuff that you find there.

So with the internet iceberg how we're comparing this as we have the surface web, the deep web and the dark web. So this, as Ham here was saying surface web, you got your general public sites that, you and me visit every day. It could be YouTube, Amazon. Facebook Instagram, you know?

Okay. I'm going to look at clothes here or I use D2L for my school.

Ham: Yeah.

Nathan: Anything like that, that would be considered surface web it's public. It's accessible to pretty much everybody. However you need it. Deep web, as you're saying, I'll just cover it a bit more quick, deep web it's the stuff behind closed doors, but it's not the stuff that

and down hundred feet. So deep web could consist things, like medical records, hidden Wiki, private networks research papers actually. And, just all the data that's being stored, hidden behind these closed doors. And then we get into the fun part, which I'm sure most people want to hear about.

Which is the dark web. So I'm going to let you just take a lead on this for the start here. So you said you've had experience with dark web. Do you just want to tell us that story?

Ham: Yeah. I mean many, many years ago about about 10 years ago now, actually I was 16 years old and me and my friends as, you know, dumb teenagers, do we go around and we find fun things on the internet.

Little did we know we stumbled upon with a little bit of computer finagling, I have a friend of mine who's a complete computer Wiz and knows how to get almost anywhere. He found our way into the dark web.

Nathan: Are you familiar with how he did it by any chance? Not a darn clue. I'll just cover one of the main ways for people here.

It's called the onion router. I don't know if you've heard of that.

Ham: I've heard, I've heard of it. I don't know what it does though.

Nathan: It's like its own its own like network kind of sure. Wiggle your way in. So yeah. Do you want to continue with the story?

Ham: Yeah. Yeah, absolutely. We, we got our way into it and there was like, we heard we can search up literally anything. You can be whatever you want from like Bitcoin, which is now a huge topic. Nowadays. This is when we first heard about it. When one Bitcoin used to cost around three K, like three K in USD, and that is a lot of money.

That is a huge amount of money. We learned that you would pay X amount of money for whatever you want

You know, Bitcoin doge coin send that sucker straight to the moon.

Nathan: Yeah. I mean you now, nowadays you think about it everybody's pretty much got their hands dipped in the cryptocurrency of some courts as previously. I don't think most people realize that this was the main currency and has been on the dark web.

Yeah. A long time, like, especially Bitcoin, as you were saying more than that, like Bitcoin runs the dark web.

Ham: It really does, with how, for how many things that are down there, people traded weapons. There was human trafficking, like so many dark terrible things that you can imagine are on the dark web. And it's definitely not a place an average person should go.

Nathan: And it's not by any means, as you were saying, guys with the dark web, you can't just get into the dark web by searching for it online. It's own thing. So, you know, we have the surface web, which is what you use with your Google, your safari, or Firefox. The dark web is its own people have their own accesses to get into this sort of thing.

And these markets, as you were saying, the dark web markets, you got drug trafficking, weapon, trading, human trafficking, all this sort of stuff. If there's anything that you can think of that's bad and that goes on. You can usually find it on the dark web and it covers everything.

Ham: And it's so like massive, there's also like people buy organs. That's probably some of the tamer side of things that come on, surprisingly for anyone listening.

These people go to great lengths to get what they want and they'll pay doesn't matter what it is. They'll pay, 40,000 for whatever they want and all of this was with cryptocurrency.

Like you were talking about cryptocurrency back in, oh gosh, 2013, 2011.

Nathan: Spare change compared to what it's at now.

Ham: Oh my gosh. They'll literally do whatever they want.

Nathan: And that's the thing I've heard stories from people that they went on there and someone just said that. How's it going first name? how you doing? Yeah. Oh my, and then you got certain people who are on the dark web and they, they might not be good characters.

You know what I mean? And they're very evil and it's not a good thing because these people might be completely protected. Again, it's the dark web. Usually have some pretty bad actors on there as well.

And I mean, it's, these people are pretty smart with how they got onto it. Okay. They're not, new, they're not noobs when it comes to dark web is a good way to explain it. They're probably seasoned veterans with how things go, the, all the functions of it and, coming in, I don't recommend it for anyone

oh yeah, this sounds fun. Let me do it. Not a good idea. It's not fun. Ya. So do you want to continue with your story then?

Ham: yeah. So like we searched Bitcoin, mainly like searched Bitcoin, and then after that we got link upon link of different ways to like buy anything for Bitcoin, anything associated. Okay. And we saw Hitman and I was like, and that is the scariest thing being 16. I was just a teenager. Now I'm now I'm a full grown adult and I'd never want to go back. It was a

horrifying experience to say the least in being in there. Someone can track you and they'll dox you.

These are bad actors, they're seasoned veterans.

They'll find you want to find you. They can find you. Can we go over really quick about what doxing is.

Like finding people's place, where they live.

Nathan: They can snag any information about your network that you're on, they can usually back trace it to you in particular.

And then your IP address can be traced to your house or your city to your actual address yeah. All that. And yeah, it's basically just backpedaling from they get, they grab this piece of information from your online presence, and then they just follow that back. They just follow the trail to you.

Ham: Oh, that's so scary.

Nathan: And, weapons have been sold. Yup.

It's not just these small, small, like little auctions going on. Like people saw big things for millions of dollars. People saw vehicles that are military equipment, military grade, full on war equipment there.

Yeah. On that auction house. And it's insane. I, anything basically all the legal stuff that you can't do in the public. Goes on here. And as you mentioned, drug trafficking, huge one. Have you ever heard of silk road ham?

Yes. So for anyone who doesn't know, the silk road is a pretty good story. So basically it has to do with a guy named I think it was Dread Pirate Roberts. That sounds about right. But he basically became a drug Lord over, the dark web and kind of with this drug trading going on. And it's a huge story, you know, that involved the FBI and I'm getting onto him and a bunch of different people were associated through him because he became a pretty well-known figure on the dark web where he was selling all these drugs and stuff. And for anyone who hasn't read it, I would highly recommend that it's a good book. If you haven't read it really interesting really gives you an in depth description about what goes on here.

The silk road has a lot to do with drug trafficking, drug trading, all this sort of thing.

Really good story. It gives you a lot of in depth, like about just the true scale of kind of the things that go on here. So highly recommended if you haven't read it.

Ham: Yeah and I mean, especially like these people are going to they're doing so many like illegal things through the dark web. That just, it can't be tracked either.

Nathan: Nope. I, as I was saying, if people are being protected, it's not trackable. So as you mentioned, you had people buying drugs, selling weapons, human trafficking is a big problem on there. And I mean, all of these sort of things are just un-trackable. Like you have terrible people doing terrible things.

With no consequences if they're being super smart about it. Yeah. And it's just, it's some of this stuff's undetectable. It's not like we have, law enforcement or government just tracking the dark web every hour of the day, you can't cover everything that goes on. That's true. It's just the true scale of everything going on. And I mean we only mentioned like a small percentage of the bad stuff that goes on.

Ham: It can go so much darker and it's almost like too much for me to talk about. I do want to keep it PG on the podcast here. It reaches almost to a point where its disgusting. Yeah. I mean, it's just criminal.

Nathan: Some of the things that go on are just downright criminal. There's just stuff from movies, horror movies.

Ham: Like that actually reminds me of a movie. I think it's 2007 ever see the movie hostel before familiar, familiar, three U.S exchange students go over to Europe on a vacation and they end up in this hotel that isn't really a hotel.

It's actually a torture dungeon find that it's kind of stuff on the dark web. Yeah.

Nathan: It's just a reminder for anyone listening to this cool topics to read about just kind of the stuff that goes on, but do not, I can't recommend enough do not go to the dark web.

Not going to have a good time, only bad things can pretty much come from it. So, and again, just disclaimer, do not go you can read about some of this stuff, but don't actually visit it.

Ham: Yeah, I absolutely agree. Nathan, like it's yeah. As you're saying, it's a cool topic to read about, but if you, if you were to think about going down there.

Don't do it.

Nathan: And you already have, and you said you've been scarred.

Ham: I've been down there and I've been scarred for life. It's, it's where I first learned about cryptocurrency and it's why I won't buy into it now, because I know what goes on with it.

Nathan: Yeah, yeah. So yeah, that's just that I've just, backing up what we were saying.

Guys, just stay safe, goes back to this, the security in general, internet, not a safe place in general regular internet. It's usually not crazy safe place. Dark web. There's no like there's no safety. There's no safety net there. Everyone who goes there knows it's illegal. Not good. Not used for anything. Good.

Ham: Yeah.

Well, and like you were saying, I'm really quick. I just want to throw this out there. Like people like you use the example of like you go on there and someone immediately, you get a chat box saying, Hey, first name. Like people can find you they'll they'll know you like if these people want to find you, they will, they will. Exactly.

Nathan: like this happens on the dark web, people are pros on this with how they do this sort of thing.

I'm glad we got to talk about the dark web for a bit. Cause it's super interesting, scary place, but you know, not many people are familiar with it. I mean, I don't know too many people who you could actually have a full on conversation about what goes on on the dark web. That's true. So yeah, I'm hoping some of you learned something from this hopefully again, learned, do not go really like a huge disclaimer, do not go.

Yeah. But overall, internet, iceberg, fun analogy to learn about this is just a little bit of the scale. Again, we didn't cover even a portion of what happens in our time here. And, it just goes to show just how big the internet is and how crazy it can be.

So, yeah, I just want to cover again internet icebergs for the surface web deep web and dark web. That's probably the biggest things you should learn about. How about you Ham have anything to say?

Ham: Most of this stuff I'm pretty, I wouldn't say well-versed, but I know just enough about it

But it's, this episode has been, eye opening. Once again, ever every time I'm in here in the production. I learned something new, every day.

Nathan: I'm glad that's the main purpose that we're here for. So I'm just glad, I'm hoping that you guys listeners can learn something or have learned something as well. Hopefully for the better.

Ham: Yeah right!

Nathan: But overall it should you know, I'm excited that you're joining us here, you know, having a good conversation. So these are great.

Ham: This is great. The conversations we're having are phenomenal.

Nathan: Thank you for joining us again. I can't thank you enough. We've been having a great time in the episodes so far and for anyone else who wants to learn more information about our cyber aware message, just visit MNSU.edu/CyberAware

And thank you. Thank you again, Ham!

Ham: GGs Nathan

Nathan: And then we'll pass this off to Mercy for the news.

Mercy: Hey everyone. Mercy here with the news student expert on the information security team, I'll be updating you with whats going on in the cybersecurity world. Before I get into the headlines, please make sure to subscribe to our podcast. And today's highlights are watch out for a malware application called blender photo editor easy photo background editor on the Google play store. This sneaky app asks users to sign into Facebook, allowing you to steal account credentials and payment information. As of October 12th, 2021, the application has over 5,000 downloads, but has been removed from the Google play store as of now.

Use this as a reminder to double check your applications and their permissions or else be careful what you download. Our second news update today, Verizon users be aware of a phishing attempt inky technology corporation researchers have found and new phishing attempt that is impersonating Verizon's logo.

If you look carefully this phishing message. You'll notice the V in the Verizon is replaced with a square root symbol. This incorrect logo is a telltale sign that this message is fake. Phishing is also happening through text messages from the number 562-661-159. The message notifies users that have already paid their bill for that previous month and offers a reward or gift.

When you click on the link to secure your award, you will be asked to fill a form, including your name, phone number, address, and social security number. Be aware. This is fake and there is no reward to be given. Instead, your information will be stolen always watch out for phishing messages, practice safe clicking and never give out personal information.

Our third news update today, Japanese company Olympus confirmed a second cyber attack over the week. Olympus a medical technology company based in Japan announced on October 12th, 2021 that it was hit by a cyber attack. The company was forced to shut down, affecting IT systems in Canada, the United States and Latin America Olympus said in a statement, we are walking with appropriate third parties on this situation and we'll continue to all necessary measures to save our customers and business partners in a secure way. The second attack came after the same company was hit with the ransomeware attack by a group called black matter reported just a few days prior. The ransomeware group black matter has been very active, recently hitting an Iowa best farm cooperative with an attack that asked for about \$5.9 million after compromising its computer systems.

And that wraps up the news for this week. Thanks for listening to the CyberAware Podcast. We'll see you next time.