

# CYBERSECURITY DURING THE COVID ERA

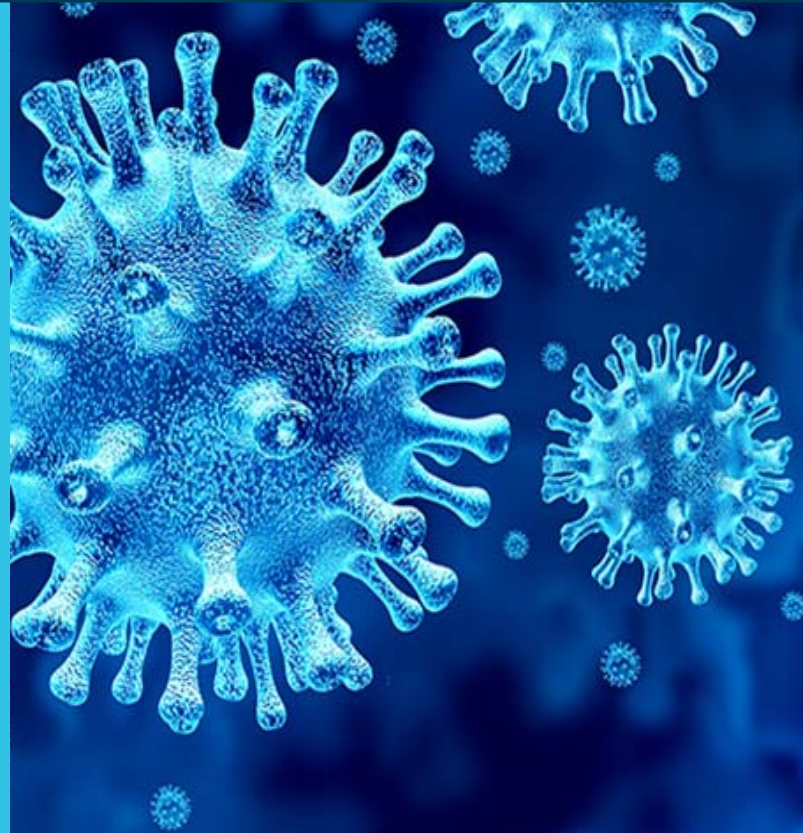
CONSIDERATIONS IN THE AGE OF  
COVID-19

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PRESENTED BY: Michael Camacho and Matt Wagenknecht

TUESDAY, MAY 19, 2020

11:00AM – 12:00PM EST



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## WELCOME & INTRODUCTION



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## AGENDA / LEARNING OBJECTIVES

- IT & Cyber Considerations
  - Why cybersecurity is so critically important
    - Latest Cyber Trends
  - Understand IT & Cyber Risks In the COVID Era
    - Working from Home Implications
    - Recession-Related Considerations
    - Other IT Security Implications
- Tales from the Dark Web – Hacking Demos
- Where Do You Start?
- Q&A



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## POLLING QUESTION #1

**Do you consider cybersecurity to be an important risk for your company?**



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# IT & CYBER CONSIDERATIONS



Presented by: Michael Camacho, CPA, CIA



## THE STATISTICS

Average Cost per  
Record Stolen:  
\$150/record  
(up from \$148 in 2018)

Average Number of  
Records lost per  
Breach:  
25,575 records

Average Days to  
Detect Breach: 206  
(up from 191 days in  
2018)

Average Days to  
Contain Breach: 73  
(up from 66 days in 2018)

Average cost of a  
breach is 39.5%  
higher when a  
Company is not  
prepared

Further Reduction in  
Cost when  
Automated Security  
Solutions are in  
Place: 8%



## THE STATISTICS (continued)

Average Cost per Breach: \$3.92M  
(\$1.99M for Hospitality)

Percentage of Breach Cost from Loss of Business: 36%

Average Cost per Breach per employee +25,000 Employees: \$204/employee

Average Cost per Breach per employee 500-1000 Employees: \$3,523/employee

Breach Cost Allocation by Year:  
Year 1: 67%  
Year 2: 22%  
Years 3+: 11%

Likelihood of recurring breach: 29.6%  
(up from 27.9% in 2018)



## THE STATISTICS (continued)

- 5 billion records were lost, stolen, or exposed in 2018
- There is a cyber attack every 39 seconds
- 75% of the Healthcare industry has been infected with malware
- 84% of auto dealer customers WOULD NOT purchase from a dealership if their data was compromised
- 43% of cyber attacks target small businesses
- 91% of breaches are the result of phishing attacks





## THE STATISTICS – TRAC Experience 2019/2020

- Incidents/Breaches TRAC has responded to in 2019/2020:
  - 21
  - Compared to 3 in 2017 and 2018 combined!
- Average business downtime during a breach
  - One to two weeks (longest just over a month)
- Average cost per breach response:
  - \$75,000 for breach response services
  - Exponentially higher for downtime, legal fees, tech expenditures, etc.
- Hackers are industry agnostic



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## POLLING QUESTION #2

**Are your concerns around fraud and cybersecurity risk heightened since the COVID-19 onset?**



## COVID ERA IMPACT WORK FROM HOME CONSIDERATIONS

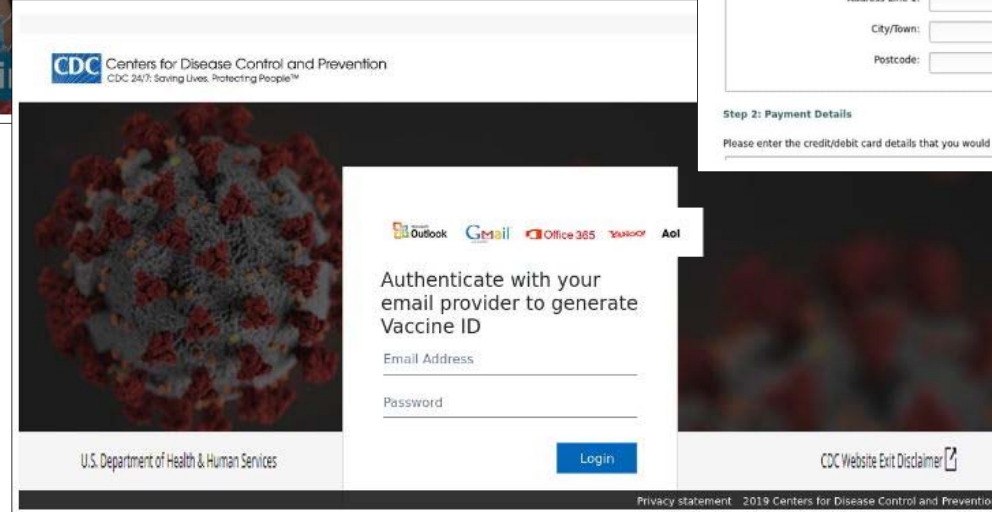
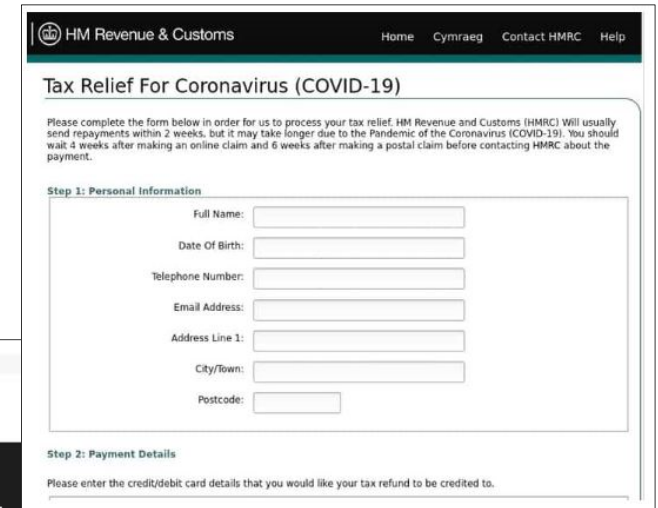
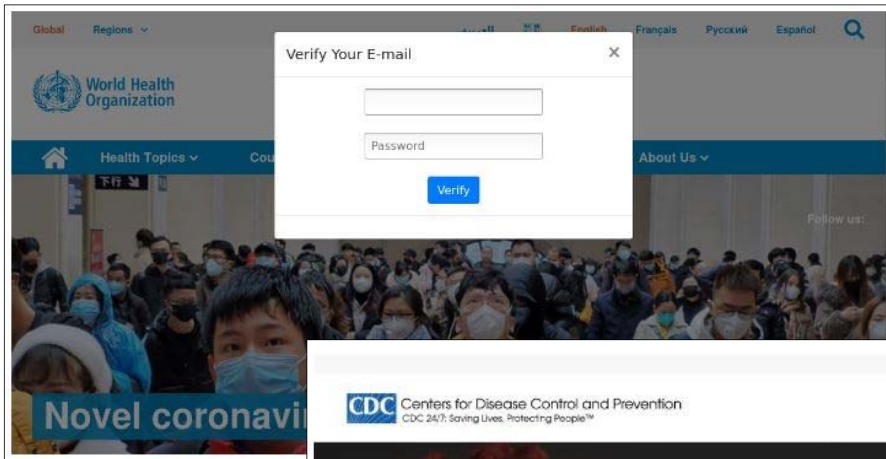
- Security weaknesses on employee home networks
  - VPN only protects the remote connection to the office
  - VPN networks set-up recently “in a rush” to allow employees to work from home
  - VPN networks have seen a huge spike in utilization
  
- More Consumer-Oriented Online Services
  - Online operations are relying more on web-based services (for work and personal)
  - Increases risk associated with:
    - Phishing
    - Coronavirus Malware
    - Fake Coronavirus information, websites and online portals



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# WORK FROM HOME CONSIDERATIONS (continued)

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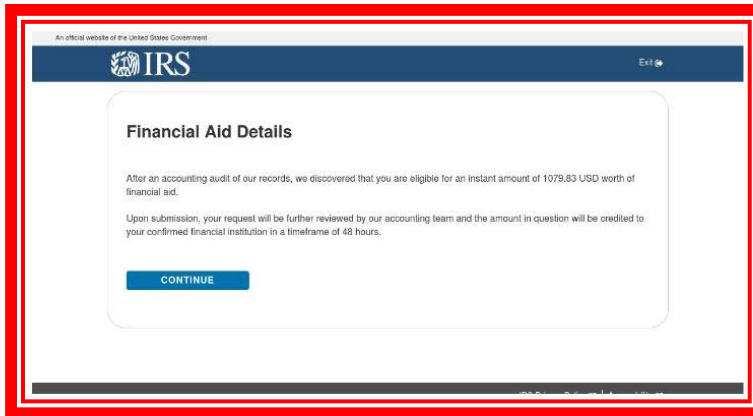




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# WORK FROM HOME CONSIDERATIONS (continued)



An official website of the United States Government

IRS

### Financial Aid Details

After an accounting audit of our records, we discovered that you are eligible for an instant amount of 1079.83 USD worth of financial aid.

Upon submission, your request will be further reviewed by our accounting team and the amount in question will be credited to your confirmed financial institution in a timeframe of 48 hours.

[CONTINUE](#)



IRS

### Get My Payment

If you need additional help, please visit our [Frequently Asked Questions](#) page.

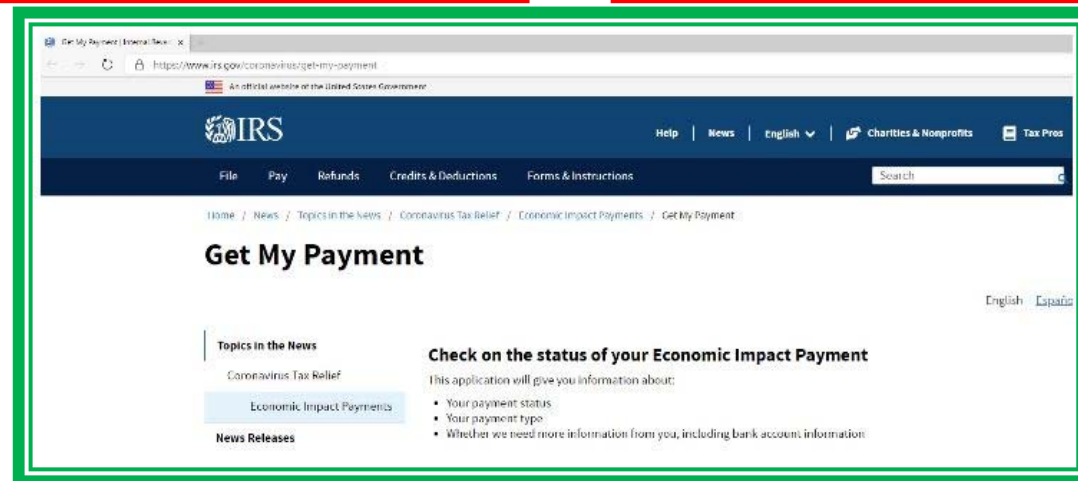
All fields marked with an \* (asterisk) are required.

Social Security Number (SSN) \*

Date of Birth \*\*  
MMDDYYYY

Full Name \*

ZIP or Postal Code \* (Required, except for countries without ZIP or postal codes)



IRS

Help | News | English | Charities & Nonprofits | Tax Pros

File | Pay | Refunds | Credits & Deductions | Forms & Instructions

Home / News / Topics in the News / Coronavirus Tax Relief / Economic Impact Payments / Get My Payment

## Get My Payment

English | Español

**Topics in the News**

- Coronavirus Tax Relief
- Economic Impact Payments**
- News Releases

**Check on the status of your Economic Impact Payment**

This application will give you information about:

- Your payment status
- Your payment type
- Whether we need more information from you, including bank account information



# COVID ERA IMPACT WORK FROM HOME CONSIDERATIONS

(continued)

- End Point Security
  - A remote workforce can make it more difficult for IT staff to monitor and contain threats to network security.
    - In an office environment, when a threat is detected, IT can immediately quarantine the device, disconnecting the endpoint (i.e. the compromised computer) from the corporate network while conducting investigations.
- Transfer of data/information on removable devices/cloud sources
  - Not having access to desktop data may result in employees moving sensitive data to unprotected devices at home via removable drives or cloud-based solutions.
- Employee training likely not designed to consider risks of working remotely



## COVID ERA IMPACT RECESSION IMPLICATIONS

- Financially-impacted employees
  - Monitoring of unusual activity by employees is paramount during this time
  - Specific focus on applications with ability to manage cash or items convertible to cash
- Disgruntled employees (e.g. Sabotage files or programs)
  - Access security needs to be closely monitored and controlled
  - Proper back-up storage can help reverse/recover any retaliation impacts on business operations
- Workforce reductions
  - Timely deactivation of access is imperative to avoid potential opportunities for fraud or damage/theft of data



## COVID ERA IMPACT OTHER IT SECURITY IMPLICATIONS

- Nation States
  - Attacks for certain businesses have been high
  - Risk only increases at a time of crisis with hackers looking to exploit those weaknesses.
- The Supply-Chain Effect and Third-Party Vendors
  - Organizations tend to show higher dependency on outsourced tools to maintain their ongoing operations and preserve their capacity for survival.
  - This could result in higher exposure of sensitive data, breaking security protocols and expanding the potentials for supply-chain attacks.
  - Need to evaluate controls of third-party vendors (SOC 1 or 2 Reports)





## EXAMPLES

- The Quiet Observer – Office 365 Exploits
- Seek and Destroy – A Phishing Tale
- Facebook Blunders – A Picture worth a Million Words
- The Weakest Link – I Can't Believe I Clicked It...Again.



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## POLLING QUESTION #3

**Has your organization had a cyber incident or breach in the past two years?**



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# TALES FROM THE DARK WEB HACKING DEMOS



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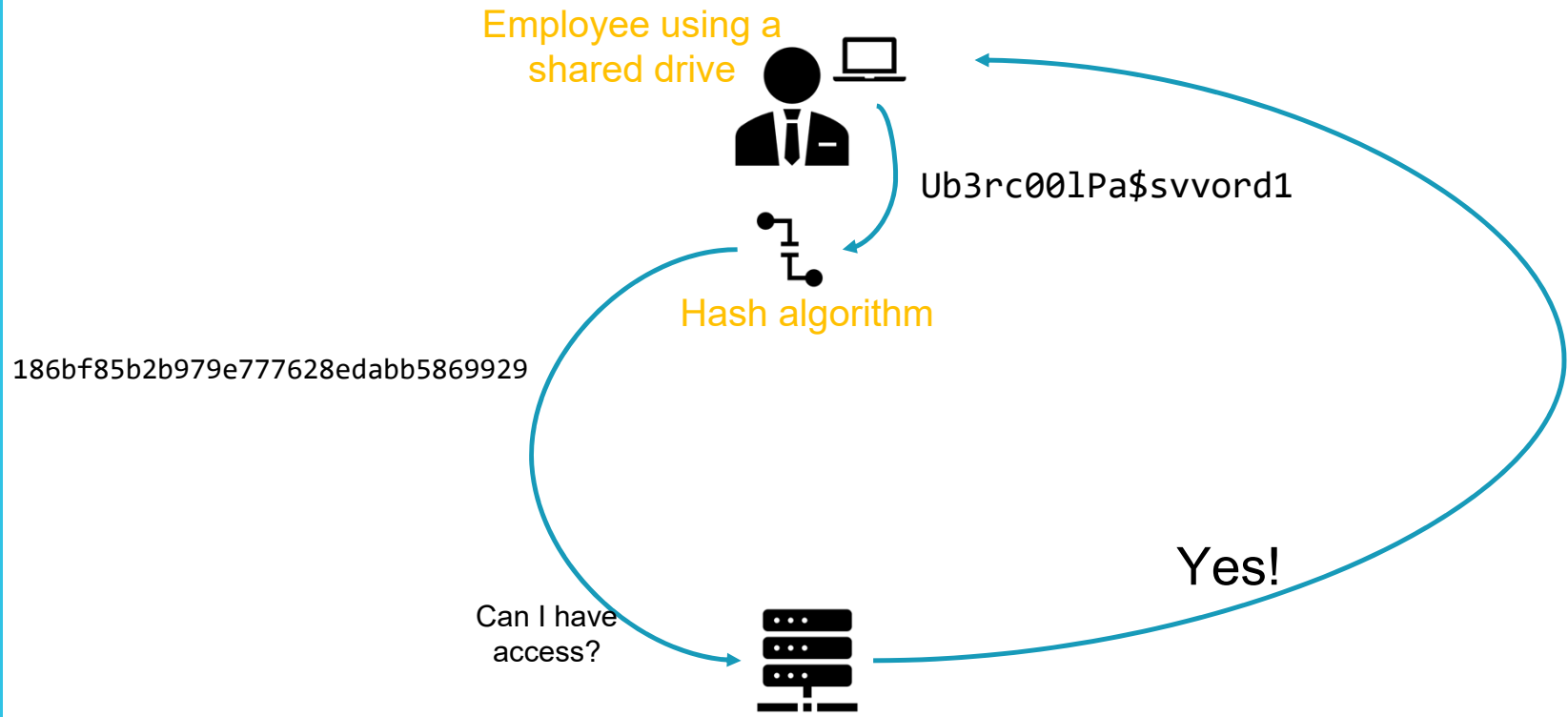
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**DEMO #1**

**PASSWORD HACKING DEMO**

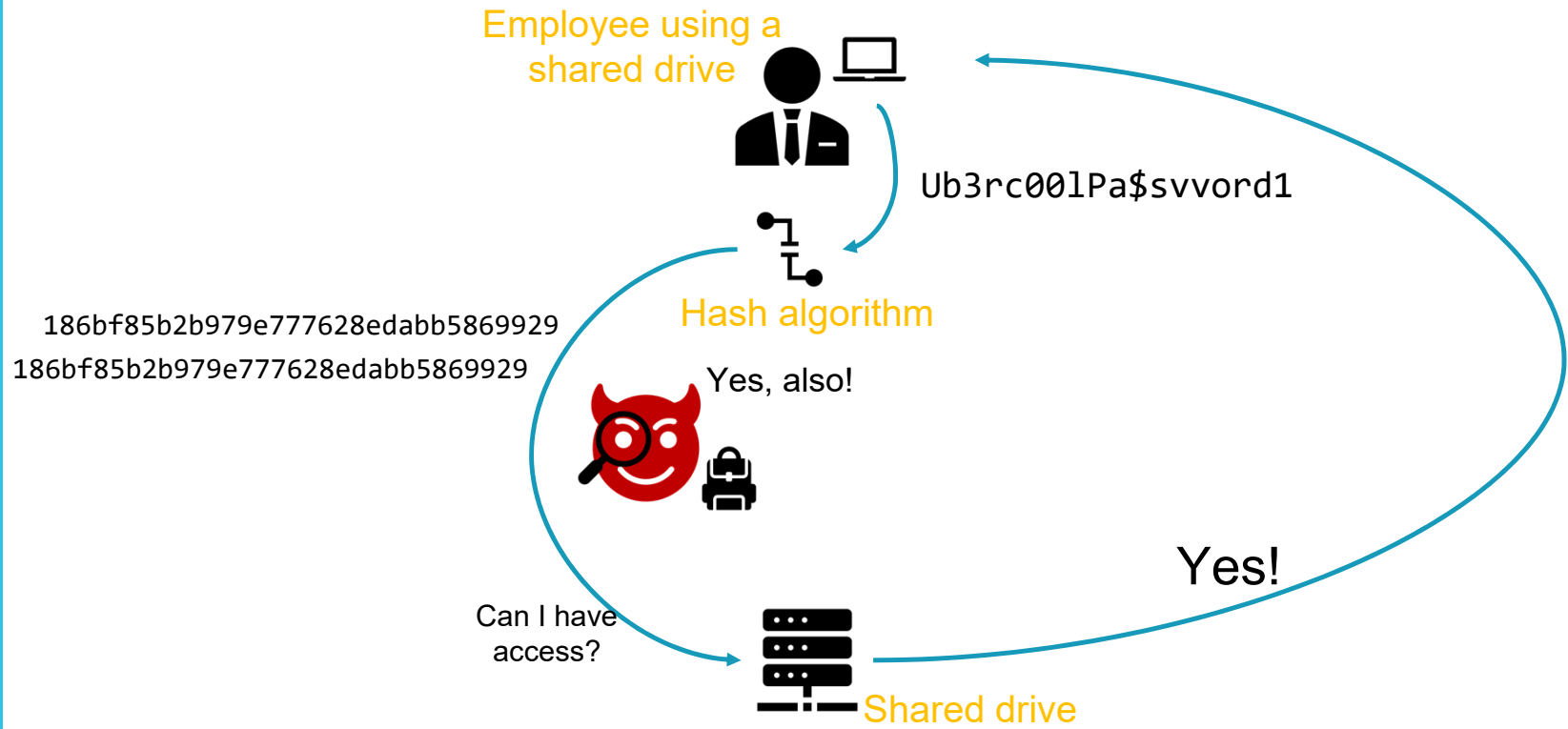


# HOW PASSWORD HASHING WORKS





# HOW PASSWORD STEALING WORKS





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**DEMO #2**

**RANSOMWARE DEMO**



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## POLLING QUESTION #4

**Do you think your company is prepared to respond to a cyber attack?**





## WHERE DO YOU START?

- UNDERSTAND your cyber-risk profile
- Be PROACTIVE in your approach to data security
- Trust, but VERIFY
- Don't forget COMPLIANCE
- EDUCATE your employees and clients



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## POLLING QUESTION #5

**Would you like additional information about protecting the people, data, and technology at your company from heightened cybersecurity risk?**



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## Q&A





# Stay Informed

Citrin Cooperman COVID-19  
Response Unit  
[www.citrincooperman.com/CRU](http://www.citrincooperman.com/CRU)