# CyberSN.com

## The Cyber Security Hiring Crisis:

A CyberSN Research Study

conducted by

The Jane Bond Project Founder, Chenxi Wang, PhD.

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## Cyber SN.com

Friends,

Our lack of real-time salary data and our poor hiring practices are causing unnecessary stress and productivity breakdown. The cyber security talent shortage is not an excuse for unfilled positions. CyberSN has performed thousands of searches and compiled valuable data that shows why jobs go unfilled for reasons beyond the talent shortage. We commissioned a research study focused on hiring challenges in cyber security, conducted by Dr. Chenxi Wang, PhD. of the The Jane Bond Project.

For over 20 years, I have worked side-by-side with technologists and cyber security professionals. I have consistently felt the pain that occurs when a team is overworked and understaffed. I commissioned this study to empower organizations that want to hire and retain cyber talent regardless of the talent shortage.

Spread the word: you and your teams no longer have to suffer!

Love,

#### **Deidre Diamond**

Founder and CEO
CyberSN (cybersn.com)
brainbabe (brainbabe.org)

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#### Introduction

Cyber security is one of the most important and fastest growing professions in the world. We conducted this research project to better understand common practices, challenges, and pitfalls of cyber-recruiting. Our methodology is a combination of collected data and in-depth interviews:

- We gathered data across 52 organizations and 83 cyber security positions - including but not limited to security engineers, product sales engineers, IR and SOC analysts, and product security experts.
- We also conducted in-depth interviews with CISOs and hiring managers from five organizations:
  - 1. Hiring manager at a fast-growing California SaaS company
  - 2. Product security lead for a large storage company
  - 3. CISO of a non-profit R&D organization on the east coast
  - 4. CISO of a consumer IoT company
  - 5. Director of product security for a large medical device manufacturer

#### **Key Findings**

Companies that are interested in filling their security positions should consider the following key findings:

- The primary reasons why recruiting is difficult boils down to: lack of talent, a broken HR process, and unreliable compensation data for cyber security positions.
- Cyber security positions remain open for an average of 6 months before the company engages with an external recruiting firm.



- For recruiting, hiring managers could not rely on the HR recruiting channel. They drew on their personal networks and social media instead.
- According to our aggregate data, women only fill about 8% of available cyber security positions.
- 80% of CISOs and hiring managers reported that cyber security recruiting is "very difficult."

#### **Survey Results**

The primary reasons why recruiting is difficult boil down to: lack of talent, a broken HR process, and unreliable compensation data for cyber security positions.

- 100% of our interviewees indicated that recruiting for cyber security positions was difficult.
- 80% of our interviewees said that recruiting for cyber security positions was "very difficult."

Figure 1.1: Cyber Security Recruiting Is "Very Difficult" Across The Spectrum

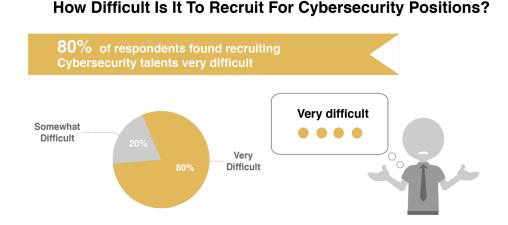




Figure 1.2: Top 3 Reasons Why Recruiting For Cyber Security Is Difficult

**Top 3 Reasons** 

Why Recruiting For Cybersecurity Is Difficult **Cloud Security** 0 0 0 0 There simply aren't that many experienced security professionals available. IoT Security - Hiring manager from SaaS company Management " Generalist recruiting does not work for security. We need HR to understand the specific personality traits. - Director of product security for a large medical device manufacturer **UNRELIABLE COMPENSATION INFORMATION** The industry data for IT salaries appears to be low and not accurate for the security industry. \$ - Product security lead at a large storage company "

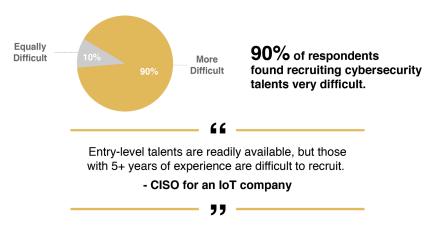
## Recruiting experienced talent is significantly more difficult and takes longer than hiring for junior-level cyber security positions.

 90% found it more difficult to recruit senior/experienced cyber security workers than junior workers.



Figure 2: Hiring Experienced Workers Is "Much More Difficult" Than Hiring Entry-Level Workers

#### Is It More Difficult To Recruit Experienced Positions?



## The majority of companies needed to raise their salary caps to hire cyber security talent.

#### According to our in-depth interviews:

- All of the interviewees asserted that HR is ineffective at sourcing capable cyber security talent.
- More than 80% of the cyber security positions were hired at a salary higher than the initial range offered.



Figure 2.1: More Than 50% Of The Companies Had to Increase The Initial Salary Cap To Hire

### More Than 50% Of The Companies Had to Increase The Initial Salary Cap To Hire



Current Human Resources salary reviews and adjustments still fall behind competitive cyber security industry demands.

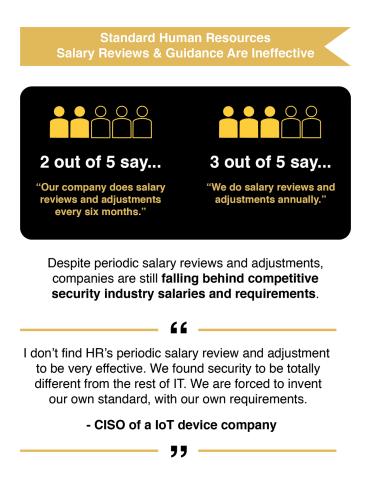
- 2 out of 5 respondents said their companies conducts salary reviews and adjustments every six months.
- 3 out of 5 respondents said their companies conduct salary reviews and adjustments **annually**.

Despite regular salary reviews and adjustments, companies still have a difficult time meeting cyber security industry demands, as evidenced by how many companies need to raise the salary cap in order to hire. Our



interviewees agreed that traditional HR practices around salary reviews and adjustments fail to meet industry requirements. This issue is compounded by the fact that there is no accurate, widely available salary data for the cyber security industry.

Figure 3: Standard HR Industry Salary Guides And Reviews Are Ineffective



Source: In-depth Interviews



Of the 83 Cybersecurity positions surveyed, we found that only 8% of roles were held by women; none of the female candidates negotiated a higher salary.

According to the collected survey data:

- Out of 83 positions available, only 7 positions were filled by women candidates.
- None of the female candidates managed to negotiate a salary higher than what was initially offered.

Figure 4: Recruiting Women In Cyber Security Positions



Source: Aggregate data



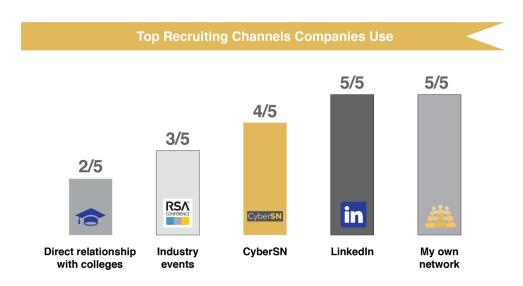
### Hiring managers tend to use personal networks and social media rather than traditional HR recruiting channels.

During our in-depth interviews, when asked which recruiting channels they typically use, the interviewees said:

 The top three recruiting channels that companies used for recruiting included: [their] own network, LinkedIn, and external agencies like CyberSN.

## None of the respondents listed their internal HR recruiters as an effective recruiting channel.

Figure 5: Top Recruiting Channels Companies Use



Cyber security positions often remain open for an average of 6 months (between 4-9 months) **before** the company engages with an external recruiting firm.

Our data shows that on average cyber security positions were open **four to nine months** before an organization actively engages an external



recruiting. In contrast, on average **a position is filled within 1.5 months** by CyberSN.

Figure 6: Average Time Cyber Security Positions Remained Open



#### Conclusion

Many of our interviewees echoed the sentiment that there's a lack of security talent in the industry, which becomes more pronounced when recruiting for more senior talent. Now more than ever, companies are competing against the likes of Netflix, Google and Facebook for high quality candidates. The lack of transparent data around salaries makes it tougher to make the right decisions. In order to recruit more effectively for cyber security industry positions, there's a clear demand for accurate information that includes real-time, market-driven compensation data.

