

Cybersecurity and Connected platforms - Securing the future of Pay TV

As we're all aware, cybersecurity is a major threat in today's world. With threats evolving on a daily basis, research and development activities have stepped up. As cyber crimes become increasingly advanced, new systems must be put into place to protect us all, as Peter Oggel, Chief Technology Officer at Irdeto, explains.

In the satellite and pay TV industries, there has perhaps been a view in the past that cybersecurity is focused on protection of the network and the threat from hackers to systems and data. In today's climate however, this is not the case, as threats to customer data and high value content often come from the same place. The same digital and connected TV platforms that cybercriminals target for illegal redistribution of content also act as attack surfaces for hackers looking to gain access to networks and potentially steal customer information and other important data. As a result, it is crucial for approaches to security to evolve in line with the changing market dynamics.

The problem for operators is that today's cybercriminals have the same resources as enterprise businesses at their disposal. They invest in product research and development, produce and distribute their products and services. Today's cybercriminal has customers to satisfy, money to be made and must consider their ROI just like any other business.

The evolution of cybercrime

Content redistribution is still the biggest threat to the pay TV industry and the size of the problem was emphasized by a report from Digital TV Research late last year which forecast that losses to online TV and movie piracy will nearly double to almost \$52 billion by 2022. However, piracy is now part of a wider cybercrime threat that is increasingly focused on newer connected devices and industries. In today's world, any legitimate insecure device can be abused for cybercrime, and pirated services can be streamed from anywhere on the internet. In tandem, as consumers demand more flexibility, ease of access and convenience, it ultimately introduces openings.

For example, increased connectivity and the way in which the pay TV industry has evolved in recent years has seen the rise of IPTV set-top boxes and OTT services delivering high value content to a broad range of unmanaged devices. While great for the user experience, any connected device is

GaN BUCs

for your mission-critical applications



The last word in GaN BUCs from the first name in HPAs.

CPI GaN BUCs are an excellent choice for maritime, oil and gas, milsatcom, IFE, SOTM, and other uplink applications. Built in lighter and smaller packages than comparable GaAs-powered BUCs, CPI GaN BUCs run cooler and consume less power, resulting in longer life and a better ROI. Whether your system is radome-based, exposed to the elements or is in an air-conditioned shelter, our GaN BUCs are a reliable, efficient solution.

Call CPI today or visit **www.cpii.com/buc** to learn more about our GaN BUC product line, and how we are uniquely qualified to provide you with the most appropriate technical solution for your desired frequency range, power level and bandwidth.



80 W Ku-band BUC

160 W Ka-band BUC

Download our new app! Search: CPI Satcom









a potential attack point for hackers. The rise of illegal plugins through Kodi devices is also a huge threat as it makes it easier for pirates to illegally redistribute content. Meanwhile the dangers of the Darknet are just as prominent, where stolen data is available for purchase in abundance. This data includes pay TV credentials. Stealing credentials provides cybercriminals with more flexibility and gives them a lower chance of discovery as opposed to say hacking an operators' network. This has resulted in a multi-layer threat where operators must also consider vulnerabilities and attacks on their network and systems, including ransomware, malware injections, Man-in-the-Middle and Man-at-the-End attacks.

Protection from all sides

Content theft is a threat that satellite and pay TV operators have been facing for many years and, as a result, many have become adept at evolving their defences in line with the changing threat landscape.

Many successful providers have realized that fighting online piracy requires more than just technology alone and that services are essential to combat new and emerging piracy threats.

However, this is now part of a wider cybercrime threat, where increasing vulnerabilities and sophistication of attacks create additional challenges and the combination of technology and proactive services has never been more crucial in the fight cybercrime.

Many organizations are only just starting to recognize cybercrime as it truly is — a competing business entity that continues to grow its illegal offerings. In addition to attacking content assets, cybercriminals today also steal subscriber data for access to service provider services and monetizing the sale of the subscriber credentials. As a result, cybersecurity strategies within the industry must continue to evolve in order the adequately combat this dynamic and persistent threat.

Premium security today means 360-degree protection trusted by content owners, from protecting broadcast and OTT services, to end-to-end piracy control and watermarking. Cybercrime prevention services are also a crucial part of this and include cyber intelligence (the gathering and analyzing of intelligence around security threats from the Internet and Darknet) and cybersecurity (actions to make digital platforms more secure such as penetration testing, security risk assessments, and incident planning and response). Once more and more organizations have made this security mindshift, the more effective the industry will be at recognizing and combating cybercrime.





- Business Communications
- Corporate Networks
- Telecommunication Services
- GSM Backhauling
- IP Trunking Services
- Government Services

Space to deliver your vision













www.eshailsat.ga