

NCL Spring 2025 Individual Game Scouting Report

Dear Andre Castillo.

Thank you for participating in the National Cyber League (NCL) Spring 2025 Season! Our goal is to prepare the next generation of cybersecurity professionals, and your participation is helping achieve that goal.

The NCL was founded in May 2011 to provide an ongoing virtual training ground for collegiate students to develop, practice, and validate their cybersecurity skills in preparation for further learning, industry certifications, and career readiness. The NCL scenario-based challenges were designed around performance-based exam objectives of CompTIA certifications and are aligned to the National Initiative for Cybersecurity Education (NICE) Cybersecurity Workforce Framework published by the National Institute of Standards and Technology (NIST).

As you look to a future career in cybersecurity, we hope you find this report to be valuable in both validating skills and identifying areas for improvement across the nine NCL skills categories. You can use this NCL Scouting Report to:

- Validate your skills to employers in any job application or professional portfolio;
- Show case your achievements and strengths by including the Score Card view of your performance as part of your résumé or simply sharing the validation link so that others may view the detailed version of this report.

The NCL Spring 2025 Season had 9,216 students/players and 596 faculty/coaches from 510 two- and four-year schools & 288 high schools across all 50 U.S. states registered to play. The Individual Game Capture the Flag (CTF) event took place from April 11 through April 13. The Team Game CTF event took place from April 25 through April 27. The games were conducted in real-time for students across the country.

NCL is powered by Cyber Skyline's cloud-based skills evaluation platform. Cyber Skyline hosted the scenario-driven cybersecurity challenges for players to compete and track their progress in real-time.



To validate this report, please access: cyberskyline.com/report/90TVM31WKBE7



Based on the performance detailed in this NCL Scouting Report, you have earned 10 hours of CompTIA. Continuing Education Units (CEUs) as approved by CompTIA. You can learn more about the NCL -CompTIA alignment via nationalcyberleague.org/partners.

Congratulations for your participation in the NCL Spring 2025 Individual Game! We hope you will continue to develop your knowledge and skills and make meaningful contributions as part of the Information Security workforce!

Dr. David Zeichick **NCL** Commissioner



NATIONAL CYBER LEAGUE SCORE CARD

NCL SPRING 2025 INDIVIDUAL GAME

NATIONAL RANK 767TH PLACE OUT OF 8573 PERCENTILE 92ND

NETWORK TRAFFIC ANALYSIS 94TH PERCENTILE

YOUR TOP CATEGORIES

SCANNING & 94TH PERCENTILE

93RD PERCENTILE



Average: 66.8%

cyberskyline.com/report ID: 90TVM31WKBE7



NCL Spring 2025 Individual Game

The NCL Individual Game is designed for student players nationwide to compete in realtime in the categories listed below. The Individual Game evaluates the technical cybersecurity skills of the individual, without the assistance of others.

TH PLACE

70.7% ACCURACY



92nd National

Average: 995.3 Points

Average: 66.8%

Average: 37.7%

Cryptography	250 POINTS OUT OF 385	71.4% ACCURACY	COMPLETION:	78.9%
Identify techniques used to encrypt or obfuscate message extract the plaintext.	es and leverage tools to	ACCONACT		
Enumeration & Exploitation	130 POINTS OUT OF 365	100.0% ACCURACY	COMPLETION:	52.6%
Identify actionable exploits and vulnerabilities and use the security measures in code and compiled binaries.	em to bypass the			
Forensics	195 POINTS OUT OF 305	44.4% ACCURACY	COMPLETION:	57.1%
Utilize the proper tools and techniques to analyze, process investigate digital evidence in a computer-related incident				
Log Analysis	260 POINTS OUT OF	57.1% ACCURACY	COMPLETION:	94.1%
Utilize the proper tools and techniques to establish a base operation and identify malicious activities using log files f		7.600.0.0.		
Network Traffic Analysis	200 POINTS OUT OF	78.6% ACCURACY	COMPLETION:	91.7%
Identify malicious and benign network traffic to demonstr potential security breaches.	ate an understanding of			
Open Source Intelligence	185 POINTS OUT OF 310	60.0% ACCURACY	COMPLETION:	66.7%
Utilize publicly available information such as search engin social media, and more to gain in-depth knowledge on a to				
Password Cracking	250 POINTS OUT OF 335	93.3% ACCURACY	COMPLETION:	73.7%
Identify types of password hashes and apply various tech determine plaintext passwords.	niques to efficiently	7.600.0.0.		
Scanning & Reconnaissance	280 POINTS OUT OF	72.7% ACCURACY	COMPLETION:	94.1%
Identify and use the proper tools to gain intelligence about services and potential vulnerabilities.	t a target including its	2.		
Web Application Exploitation	O POINTS OUT OF 300	0.0% ACCURACY	COMPLETION:	0.0%

Note: Survey module (100 points) was excluded from this report.



Identify actionable exploits and vulnerabilities and use them to bypass the

security measures in online services.

The National Cyber League A Community Where Cybersecurity Is a Passion

Cryptography Module

Identify techniques used to encrypt or obfuscate messages and leverage tools to extract the plaintext.

645 TH PLACE OUT OF 8573

250 POINTS OUT OF 385
PERFORMANCE SCORE

71.4% ACCURACY 78.9% COMPLETION

93rd National Percentile

Average: 143.1 Points

Average: 65.0%

Average: 44.2%

The Bases (Easy)	45 POINTS OUT OF	60.0%	COMPLETION:	100.0%	
Analyze and obtain the plaintext from messages encoded with common number bases					
Super Shifty (Easy)	55 POINTS OUT OF	100.0% ACCURACY	COMPLETION:	100.0%	
Analyze and obtain the plaintext for a message encrypte	d with a shift cipher	71000111101			
Pizza Time (Easy)	50 POINTS OUT OF	100.0% ACCURACY	COMPLETION:	100.0%	
Analyze and obtain the plaintext for a message encrypted with the rail fence cipher					
Signed (Medium)	45 POINTS OUT OF	42.9% ACCURACY	COMPLETION:	75.0%	
Identify tampered files by verifying PGP signatures		71000111101			
Altered Clouds (Medium)	55 POINTS OF SUT OF	100.0%	COMPLETION:	100.0%	
Verify the integrity of files by computing HMAC values		ACCONACT			
Zugzwang (Medium)	O POINTS OUT OF	0.0% ACCURACY	COMPLETION:	0.0%	
Decode a hidden file by implementing a decoder for a custom encoding scheme					
Kracken (Hard)	POINTS OUT OF 60	0.0% ACCURACY	COMPLETION:	0.0%	
Break XOR encryption using a bruteforce attack with a known crib					



Enumeration & Exploitation Module

Identify actionable exploits and vulnerabilities and use them to bypass the security measures in code and compiled binaries.

827 TH PLACE OUT OF 8573

130 POINTS OUT OF 365 PERFORMANCE SCORE





91 st National Percentile

Average: 111.7 Points

Average: 67.9%

Average: 41.6%

Not Affine (Easy)	75 POINTS OUT OF 75	100.0%	COMPLETION:	100.0%	
Perform code analysis on C source code to reverse a se	eries of bitwise operations	7,000,000			
CrackMe (Medium)	25 POINTS OUT OF 90	100.0% ACCURACY	COMPLETION:	50.0%	
Perform static analysis on a binary program and extract an image encoded within the binary					
Hardware Discovery (Hard)	O POINTS OUT OF 100	0.0% ACCURACY	COMPLETION:	0.0%	
Follow a hardware schematic to interpret raw signal data that is encoded using pulse width modulation					
Escalate (Hard)	30 POINTS OUT OF	100.0% ACCURACY	COMPLETION:	40.0%	

Identify and exploit a vulnerability in a compiled C binary to read data from unclosed file descriptors



Forensics Module

Utilize the proper tools and techniques to analyze, process, recover, and/or investigate digital evidence in a computer-related incident.

66 TH PLACE OUT OF 8573

44.4% ACCURACY



90th National

Average: 144.7 Points

Average: 58.4%

Average: 48.4%

Overused (Easy)	70 POINTS OUT OF 105	100.0% ACCURACY	COMPLETION:	66.7%	
Use Binwalk or other file carving tools to analyze and extract embedded files					
Oops (Medium)	75 POINTS OUT OF	16.7% ACCURACY	COMPLETION:	50.0%	
Utilize forensics tools to perform file recovery on a deleted image					
Absence (Hard)	50 POINTS OUT OF 100	100.0% ACCURACY	COMPLETION:	50.0%	

Recover a corrupted G-code file by correcting errors and fixing gaps within the file

Log Analysis Module

Utilize the proper tools and techniques to establish a baseline for normal operation and identify malicious activities using log files from various services.

NATIONAL RANK

PERFORMANCE SCORE

57.1% ACCURACY



92 nd National

Average: 164.5 Points

Average: 56.8%

100 POINTS OUT OF Analyze HTTP access logs to calculate statistics and identify trends in web traffic

77.8% ACCURACY COMPLETION: 100.0%

Leaked (Medium)

Ancient History (Easy)

38.5%

COMPLETION: 100.0%

Analyze a SQL backup log file and calculate statistics on user data

Logins (Hard)

66.7%

COMPLETION: 80.0%

Parse a binary log and perform anomaly detection to identify a compromised user based on GeoIP data



Network Traffic Analysis Module

Identify malicious and benign network traffic to demonstrate an understanding of potential security breaches.

553 RD PLACE OUT OF 8573 NATIONAL RANK 200 POINTS OUT OF 300 PERFORMANCE SCORE

78.6% ACCURACY



94th National

Average: 124.6 Points

Average: 66.3%

Average: 56.9%

Lost in Resolution (Easy)

100 POINTS OUT OF

66.7%

COMPLETION: 100.0%

Analyze a packet capture with DNS traffic to identify DNS queries and responses

Wifi (Medium)

100 POINTS OUT OF

100.0% ACCURACY

COMPLETION: 100.0%

Analyze a packet capture of WiFi network traffic and crack the password to the WiFi network

Exfil (Hard)

OUT OF

0.0% ACCURACY COMPLETION: 0.0%

Analyze a packet capture to identify and extract exfiltrated data that was encoded within x.509 certificate SAN fields

Open Source Intelligence Module

Utilize publicly available information such as search engines, public repositories, social media, and more to gain in-depth knowledge on a topic or target.

2745 TH PLACE OUT OF 8573

and their social media accounts

185 POINTS OUT OF STORY





68th National Percentile

Average: 196.4 Points

Investigate public GitHub repositories to trace connections between user actions

Average: 70.9%

Average: 66.8%

Rules of Conduct (Easy)	100 POINTS OUT OF 100	100.0%	COMPLETION:	100.0%	
Introductory challenge on acceptable conduct during NCL	-	ACCONACT			
Honor (Easy)	20 POINTS OUT OF 30	100.0% ACCURACY	COMPLETION:	66.7%	
Analyze an image to obtain data from metadata and file p	properties				
Controversial Challenge (Medium) 30 POINTS OUT OF	100.0% ACCURACY	COMPLETION:	100.0%	
Perform a reverse image search to discover open-source information about a subject					
Nostalgia (Hard)	20 POINTS OUT OF 50	25.0% ACCURACY	COMPLETION:	66.7%	
Utilize open source tools to analyze and geolocate a photo					
Meow Meow (Hard)	OUT OF	0.0% ACCURACY	COMPLETION:	0.0%	
Extract an image from an EML file and then perform a reverse image search to discover information about a target					
GitHub in Action (Hard)	15 POINTS OUT OF	50.0% accuracy	COMPLETION:	33.3%	



Password Cracking Module

Identify types of password hashes and apply various techniques to efficiently determine plaintext passwords.

903 RD PLACE OUT OF 8573 NATIONAL RANK 250 POINTS OUT OF 335 PERFORMANCE SCORE

93.3% ACCURACY



90th National Percentile

Average: 165.3 Points

Average: 86.9%

Average: 50.0%

Hash me outside! (Easy)	50 POINTS OUT OF	100.0% ACCURACY	COMPLETION:	100.0%	
Generate password hashes using MD5, SHA1, and SHA	256	7.0001.01			
We Will Rockyou (Easy)	50 POINTS OUT OF	100.0% ACCURACY	COMPLETION:	100.0%	
Crack MD5 password hashes for password found in the	RockYou breach				
Oph the Grid (Medium)	50 POINTS OUT OF	100.0% ACCURACY	COMPLETION:	100.0%	
Crack Windows NTLM password hashes using rainbow	tables				
Totally Safe PDF (Medium)	50 POINTS OUT OF	100.0% ACCURACY	COMPLETION:	100.0%	
Crack the insecure password on a protected PDF file					
put 0n th3 ma5k (Medium)	50 POINTS OUT OF	75.0% ACCURACY	COMPLETION:	100.0%	
Build a wordlist or pattern rule to crack password hashes of a known pattern					
Dice (Hard)	OUT OF 85	0.0% ACCURACY	COMPLETION:	0.0%	

Build a custom wordlist to crack passwords by augmenting permutation rules using known password complexity requirements





Scanning & Reconnaissance Module

Identify and use the proper tools to gain intelligence about a target including its services and potential vulnerabilities.

82 ND PLACE OUT OF 8573

NATIONAL RANK

72.7% ACCURACY



94th National

Average: 171.8 Points

Average: 72.8%

Average: 54.2%

COMPLETION: 100.0% Portscan (Easy) 100.0% Perform a port scan and identify services running on a remote host Dig (Medium) COMPLETION: 100.0% 87.5% Utilize DNS services to gain information about an organization's Intranet COMPLETION: 83.3% School Directory (Hard) 50.0%

Conduct reconnaissance on an LDAP server

Web Application Exploitation Module

Identify actionable exploits and vulnerabilities and use them to bypass the security measures in online services.

PERFORMANCE SCORE

0.0% ACCURACY



Average: 123.1 Points

Average: 61.9%

Average: 39.4%

Liber8Dogs (Easy)

0.0%

ACCURACY

COMPLETION: 0.0%

Find and exploit a path traversal vulnerability in a web application

Liber8tion_Login (Medium)

0.0% **ACCURACY**

COMPLETION: 0.0%

Manipulate headers to exploit improper authorization checks in middleware found in CVE-2025-29927

dogstagram (Hard)

0.0% ACCURACY COMPLETION: 0.0%

Bypass data sanitization on a login form and exploit a server side request forgery vulnerability