Roll No.	Problem Statement
	Pizza House is calling on your web development prowess to design an impressive web application that takes a deep dive into
1	session management and its various intricacies.
2	Noble Hospital needs to implement a page-level security framework with a Username & Password Authentication Scheme to provide secure access control, robust password management, and effective user authentication in its web-based system
3	Noble Hospital must enhance the safeguarding of patient and staff accounts by implementing a low-level security strategy that integrates Multi-Factor Authentication (MFA) with the dual elements of Password and OTP for heightened protection
	Bon Voyage Tours needs to deploy server-side input validation that includes the utilization of whitelisting and blacklisting, in addition to proper session management, to increase security, hinder the processing of unauthorized data, minimize associated risks, and secure the reliable functionality of its web application
5	Bon Voyage Tours is tasked with integrating a page-level security feature using a Username & Password Authentication Scheme to ensure secure access control, password management, and user authentication for its web-based travel booking application
6	Pizza House should refine its server-side input validation by employing Regex, thorough length and size checks, and numeric validation to reinforce security, ensuring that only valid and appropriately dimensioned data is processed in the restaurant's web application
	Vishwakarma University needs to develop a web application that facilitates file uploads but currently lacks robust security
	measures. This vulnerability could be exploited through the upload of malicious files. It is crucial to identify and implement strategies that would enhance the security of the file upload feature within Vishwakarma University's web application
1	Pizza House should adopt a Multi-Factor Authentication (MFA) system that employs a combination of Password and OTP to
8	provide an additional layer of security for user account safety within its order management system
9	Global Bank requires the application of a robust, low-level security solution involving Multi-Factor Authentication (MFA) with both Password and OTP to reinforce the security framework around customer and employee account access
10	Noble Hospital needs to ensure the confidentiality and integrity of data within its secure communication system by implementing input security measures that include encryption and decryption processes using Public Key/Private Key pairs
11	Noble Hospital needs to implement a page-level security framework with a Username & Password Authentication Scheme to provide secure access control, robust password management, and effective user authentication in its web-based system
- ''	Noble Hospital is required to enhance its safeguarding protocols by deploying Multi-Factor Authentication (MFA) utilizing both
12	Password and Face Recognition to amalgamate standard login information with biometric confirmation in the user authentication sequence
	Noble Hospital needs to strengthen its server-side input validation through the use of Regex, precise length and size checks, and robust numeric validation to enhance security, guaranteeing that only valid and properly scaled data is processed through the hospital's web application
	Bon Voyage Tours is tasked with integrating a page-level security feature using a Username & Password Authentication Scheme to ensure secure access control, password management, and user authentication for its web-based travel booking application
	Vishwakarma University needs to establish server-side input validation that includes both whitelisting and blacklisting approaches, alongside effective session management, to boost security measures, avert the intake of unauthorized data, reduce vulnerabilities, and guarantee the integrity of its web application functions
16	Bon Voyage Tours is tasked with the implementation of input security to protect data confidentiality and integrity within its secure communication system, utilizing Public Key/Private Key pairs for the encryption and decryption processes
	Build a web application for Pizza House that is susceptible to cross-site scripting (XSS) attacks. Present the techniques employed by attackers to inject malicious scripts into the application and execute them on the client-side. Suggest effective strategies to mitigate XSS vulnerabilities.;
18	Develop a web application for Noble Hospital that is susceptible to cross-site scripting (XSS) attacks. Illustrate the process by which an attacker can inject malicious scripts into the application and execute them on the client-side. Additionally, propose strategies to effectively mitigate XSS vulnerabilities.;
19	Vishwakarma University needs to elevate its security measures by implementing Multi-Factor Authentication (MFA) that integrates Password and Face Recognition, fusing conventional access credentials with biometric verification during the user authentication process
20	Develop a web application for Bon Voyage Tours that is vulnerable to cross-site scripting (XSS) attacks. Highlight the techniques utilized by attackers to inject malicious scripts into the application and execute them on the client-side. Furthermore, propose strategies to mitigate XSS vulnerabilities.
21	Global Bank is required to improve its server-side input validation by integrating Regex, meticulous length and size checks, and numeric validation to boost security, making certain that only authentic and correctly sized data is managed within the bank's web application
22	Global Bank needs to bolster its server-side input validation by introducing stringent controls for Date and Time formats, as well as Filetype and size, to maintain a high level of data integrity and security within its web application
23	Vishwakarma University must establish a secure communication system by implementing input security through the utilization of Public Key/Private Key pairs for encryption and decryption, thereby guaranteeing the confidentiality and integrity of data
	Noble Hospital needs to address the absence of user-based access controls in its system, a deficiency that exposes it to potential security risks. Noble Hospital should establish user-based access controls to limit user operations according to their specific privileges, thereby showing the bolstering of security and safeguarding of privacy within the hospital's application

Roll No.	Problem Statement
0.5	Join the team at Noble Hospital in crafting a cutting-edge web application that delves into the nuances of session management,
	providing an immersive experience. Demonstrate keystroke logging as a vulnerablitlty and perform key logging attack
20	Vishwakarma University needs to enhance its web application's access control by implementing page-level security through a
27	Face Recognition Authentication Scheme, guaranteeing both secure and convenient user verification
	Noble Hospital must implement server-side input validation by integrating whitelisting and blacklisting techniques, as well as secure session management, to elevate security defenses, block the entry of unauthorized data, diminish potential threats, and
28	maintain the dependable operation of its web application
29	Global Bank is seeking a skilled developer to create a web application that offers a comprehensive understanding of session management, utilizing the latest technologies and techniques.
30	Bon Voyage Tours has to integrate client-side input validation to refine the user experience and amplify security, preserving data integrity by administering format, length, and type validation checks in their web application
	Vishwakarma University is currently operating a system that lacks user-based access controls, which could result in significant
	security vulnerabilities. It is imperative that Vishwakarma University implements user-based access controls to confine user activities to their respective privileges, demonstrating the improvement of security and confidentiality within the university's
31	application system
32	Noble Hospital is tasked with establishing a Face Recognition Authentication Scheme for page-level security within its web application, aimed at ensuring secure and user-friendly verification processes
	Pizza House is set to launch a web application with a feature for uploading files, yet the security in place is currently too weak.
33	This presents an opportunity for adversaries to upload harmful files, thereby exploiting the system. Pizza House is advised to consider and deploy advanced security solutions to safeguard the file upload functionality on their web application
34	Pizza House should improve its server-side input validation by applying strict checks on Date and Time formats, as well as Filetype and size, to ensure data is handled securely and correctly within its web application
	Global Bank's system is devoid of user-based access controls, presenting possible security breaches. Global Bank must
25	integrate user-based access controls to curtail user functions based on individual privileges. This integration will exemplify the
35	fortification of security and the preservation of secrecy in the bank's application Pizza House should adopt server-side input validation incorporating both whitelisting and blacklisting methods, along with
36	rigorous session management, to enhance security protocols, bar unauthorized data submissions, mitigate associated risks, and ensure the continuous functionality of its web application
	Pizza House should develop a page-level security mechanism via a Username & Password Authentication Scheme to maintain
37	secure access control, password management, and user authentication for its online ordering system
38	Bon Voyage Tours is tasked with upgrading account security by deploying Multi-Factor Authentication (MFA) that requires both Password and OTP, ensuring a fortified defense against unauthorized access within its travel booking platform
	Pizza House must overhaul its web application to incorporate role-based access controls, which are noticeably missing at present. This change is necessary to mitigate the risks associated with unrestricted access to the company's order and delivery
	systems. Through the implementation of RBAC principles that define roles and permissions, Pizza House can show an improved security posture by ensuring that access to various system functions is determined by the user's role within the
39	restaurant's operations
	Embark on an exciting project with Bon Voyage Tours to create a web application that highlights session management in a creative and engaging way, delivering a first-class experience for users.
	Pizza House should incorporate input security protocols into its secure communication system by using Public Key/Private Key
41	pairs for encryption and decryption to maintain data confidentiality and integrity
42	Design a web application for Global Bank that is prone to cross-site scripting (XSS) attacks. Showcase the methods used by attackers to inject malicious scripts into the application and execute them on the client-side. Offer reliable strategies to mitigate XSS vulnerabilities.;
	Global Bank is required to deploy a page-level security protocol incorporating a Username & Password Authentication
43	Scheme, enhancing secure access control, password management, and user authentication for its online banking platform Viebuskarma University people to belefacility digital defenses by incorporating Multi-Easter Authentication (MEA) that combines
44	Vishwakarma University needs to bolster its digital defenses by incorporating Multi-Factor Authentication (MFA) that combines Password and OTP mechanisms to augment the security of user accounts within its educational system
45	Vishwakarma University needs to implement client-side input validation to elevate the user experience and bolster security within their web application, ensuring data integrity through meticulous checks that include format, length, and type validation
46	Global Bank must fortify its security framework by adopting Multi-Factor Authentication (MFA) that pairs Password and Face Recognition, merging usual authentication data with biometric validation for user identity confirmation
47	Pizza House requires the deployment of a Face Recognition Authentication Scheme for page-level security to improve access control, ensuring a secure and efficient user verification experience on its web application
	Bon Voyage Tours is to implement page-level security using a Face Recognition Authentication Scheme, with the objective of enhancing access control and providing a secure, yet convenient, user verification system in its web application
70	Noble Hospital is tasked with rectifying the absence of role-based access controls in its web application. The hospital must
	highlight the potential risks that come with unrestricted access to medical and patient data. The implementation of RBAC principles is crucial for Noble Hospital to assign roles and permissions, thereby showcasing how this strategy improves security
49	by restricting access to sensitive information in accordance with the roles of various healthcare staff members

Roll No.	Problem Statement
	Noble Hospital must introduce client-side input validation to improve the user interface and enhance security, guaranteeing
	data integrity by conducting comprehensive checks of format, length, and type validation within their web application Bon Voyage Tours is tasked with strengthening its protective measures by integrating Multi-Factor Authentication (MFA) with
	Password and Face Recognition, combining regular sign-in credentials with biometric checks in the process of user authentication
52	Global Bank is required to enforce data confidentiality and integrity by integrating input security with encryption and decryption mechanisms based on Public Key/Private Key pairs within its secure communication system
	Pizza House operates a system that is not equipped with user-based access controls, leaving it vulnerable to security threats. Pizza House should incorporate user-based access controls to regulate user tasks in line with their unique privileges, which will
	illustrate an enhancement in security and the protection of confidentiality in the restaurant's application
	Pizza House should incorporate client-side input validation to better the user experience and heighten security, affirming data integrity through detailed format, length, and type validation within their web application
	Global Bank must redesign its web application, which is currently designed without role-based access controls, to mitigate potential security vulnerabilities. Global Bank should elucidate the risks of allowing unrestricted access to its financial systems and client data. By adopting RBAC principles to designate specific roles and permissions, Global Bank can demonstrate the enhancement of its security measures by limiting system access based on the defined user roles within the banking institution
56	Vishwakarma University needs to enhance its web application's access control by implementing page-level security through a Face Recognition Authentication Scheme, guaranteeing both secure and convenient user verification
	Pizza House should develop a page-level security mechanism via a Username & Password Authentication Scheme to maintain secure access control, password management, and user authentication for its online ordering system
	Global Bank is required to deploy a page-level security protocol incorporating a Username & Password Authentication Scheme, enhancing secure access control, password management, and user authentication for its online banking platform
	A dynamic web application showcasing the intricacies of session management is in high demand at Vishwakarma University, and your expertise is needed to bring it to life.
	Vishwakarma University needs to address the design flaws in its web application which currently lacks role-based access controls. It is essential to illustrate the potential risks associated with unrestricted access within the educational platform. By implementing RBAC principles to assign specific roles and permissions, Vishwakarma University can demonstrate how this approach significantly enhances security by appropriately limiting access based on distinct user roles within the academic community
	Bon Voyage Tours is developing a web application that allows users to upload files, but the security is inadequate. This security gap could be manipulated by the upload of files with malicious purposes. Therefore, Bon Voyage Tours must implement some strategy to solidify the security of their file upload feature to prevent such vulnerabilities
	Noble Hospital is tasked with creating a web application that permits the uploading of files, but the security implemented is not adequately stringent. There exists a risk that malevolent files might be uploaded, exploiting this weakness. Noble Hospital must explore and apply measures to reinforce the security protocols surrounding their file upload process
63	Global Bank is in the process of building a web application that includes a file upload system, which at present, is secured insufficiently. This flaw could potentially be abused by uploading files with malicious intent. Global Bank is required to evaluate and enact security enhancements for their file upload mechanism to prevent such exploits
	Bon Voyage Tours must bolster its server-side input validation with Regex, comprehensive length and size checks, and numeric validation to strengthen security, confirming that only legitimate and suitably sized data is processed in the tour company's web application
	Global Bank is required to enforce server-side input validation that encompasses whitelisting and blacklisting strategies, coupled with stringent session management, to fortify security, prevent the submission of unauthorized data, lessen risks, and assure the stable performance of its web-based application services
66	Vishwakarma University must enhance its server-side input validation processes by enforcing rigorous checks on Date and Time formats, in addition to Filetype and size, to guarantee both secure and precise data management within its web application platform
	Global Bank is required to enforce client-side input validation to augment the user experience and strengthen security, maintaining data integrity with rigorous format, length, and type validation checks in their web application
	Create a web application for Vishwakarma University that is vulnerable to cross-site scripting (XSS) attacks. Demonstrate how an attacker can inject harmful scripts into the application and execute them on the client-side. Also, provide effective strategies to mitigate XSS vulnerabilities.;
	Bon Voyage Tours needs to reformulate the design of its web application to include role-based access controls, which are currently nonexistent. The travel agency must identify the dangers of providing unrestricted access to its booking and client itinerary systems. By applying RBAC principles to allocate distinct roles and permissions, Bon Voyage Tours can illustrate the bolstered security that comes with limiting access to sensitive information according to the specific roles of the agency's staff.
70	Global Bank must integrate a Face Recognition Authentication Scheme for page-level security to bolster access control, thereby providing secure and streamlined user verification within its web application
	Bon Voyage Tours has to reinforce server-side input validation by implementing comprehensive checks for Date and Time formats, and also Filetype and size, to provide secure and precise data handling capabilities in its web application
72	Vishwakarma University needs to enhance its web application's access control by implementing page-level security through a Face Recognition Authentication Scheme, guaranteeing both secure and convenient user verification

AS Project 1 Problem Statements

Roll No.	Problem Statement
	Noble Hospital is required to fortify server-side input validation by instituting stringent verifications for Date and Time formats, alongside Filetype and size parameters, to ensure the security and accuracy of data transactions on its web application
	Bon Voyage Tours is utilizing a system without user-based access controls, thereby inviting potential security lapses. Bon Voyage Tours ought to implement user-based access controls to restrict user activities according to their individual privileges, delineating how this measure elevates security and maintains confidentiality within the tour company's application
	Pizza House should upgrade its security infrastructure by instituting Multi-Factor Authentication (MFA) that brings together Password and Face Recognition, uniting traditional login particulars with biometric authentication in the user verification procedure