Input Validation and Sanitization

Input Validation Use Framework library - Whitelist validation - Regular expression - Escape user input Parameterized URLs Validate Data Types - Length & Size check - Images & Files - Add client side validation - Error Handling - Security Headers - Regular updates & patch - Security Audits & Testing - Education & Training - Avoid using Third-party libraries

Use framework library

React, axios - they take care of some simple issues at their own level

Whitelist validation

What data you get from user - what input keys/values are valid for data

Regular expressions

input must fit right set of regular expressions

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Escape user input

Parameterized url's

we need to specially take care of it because you may be taking some info from query params for doing somethings in your app

Validate data types always

whether you were expecting number/string/etc

Length and size check

you must always verify size of input

Real world example - DDOS attack using huge data - if we will not handle size - it can bring down server

Type/size of images/files needs to be checked/verified - take care of extensions

Add client side validation

don't just depend on server side validation(SSRF and SSJI type of attack can happen)

Having proper error handling - specially global exceptions

You should never avoid Security Headers

Regular updates and patches for libraries used

You should not take this lightly. Security related small things are constantly pushed. You must update if something is related to security

Security Audits and Testing should be done

Third party library

Avoid using third party libraries for everything because there can be security vulnerabilities

Don't use third party libraries for small things

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