Bug-tracking system

The purpose of the project is to develop simple web based bug-tracking system (this is a system that stores all reported defects during software development).

Basic Business Requirements

The system must provide the following functionality:

- Registry with developers with the following actions:
  - Add developer
  - Edit developer
  - Delete developer
  - Search for a developer – by Name, Role
- Registry with issues with the following actions:
  - Create new issue
  - Edit issue
  - Delete issue
  - Search for an issue – by ID, Title, Date of creation, Issue Type, Text contained in the description, Priority, Issue Status, Owner, Creator

Each issue has the following properties:

- ID – automatically generated identifier (cannot be changed)
- Title
- Date of creation (date when the issue was created – cannot be changed)
- Issue Type – can be defect or task
- Description
- Priority – can be low, medium, high and blocker
- Issue Status – can be "New" (by default), "In Progress" (can be set only after "New"), "Resolved" (can be set only after "In Progress"), Invalid (can be set after "New" and "In Progress")
- Owner – can be changed to any developer (this is the developer that will be working on this issue)
- Creator – the developer that created the issue (cannot be changed)

Advanced Business Requirements

Additionally the system can provide the following functionality:

- Login page
- Administration registry for users with the following actions:
  - Create developer – can be administrator or regular developer
  - Deactivate developer
  - Search for developer – by Email, Name, Type, Status, Role
- Secure the application so that only authenticated user can see pass the login page
- Add authorization so that only admin users can:
  - Put issues from "Resolved" to "New"
  - Create developer
  - Deactivate developer
  - Search for developer

- Add option for the developer to edit his own details
- Logout with redirect to the login page

"Nice to have" Business Requirements

Nice to have features are:

- System log – keeping log for occurred exceptions
- Development log – keeping log for the developers actions
- Common error handling page – all runtime exceptions to lead to common page
- Styling – style the pages