



Electronic Medical Record System

Bulwark Systems Electronic Medical Record (EMR) is a complete, integrated, reliable and maintainable software system for Patient Record Management. It is a HIPAA compliant software system that manages patient records with authentication, accuracy and confidentiality. It manages patient records that can be viewed, printed and saved on demand.

In this EMR system there is no installation needed at the user computer. The core advantage of the system is that Physical records can be scanned, indexed and stored centrally on the server with proper document type details that can be accessed from the user computer with respective access rights. Different user types like Physicians, ER, Records and Billing have different access rights to provide confidentiality and security.

The EMR system is developed to provide multiple facilities from one server and system can be accessed by internet or intranet as required. EMR is developed to meet all HIPAA regulations. Interface has been designed keeping simplicity and clean work area for physicians and other authorized users.

Features of EMR:

- Advanced Security by user access rights and encryption
- Patient register with patient specific information.
- Authentication by means of electronic signature.
- Advanced searching facilities on patient documents.
- Activity logs and log registry for all types of users.

Electronic Medical Record Modules

Patient Information:

EMR stores each patient's demographic details for doctors' diagnosis purpose. The EMR provides the mechanism for longitudinal patient data storage and easy look up.

- Patient Name
- Medical Record Number
- Date Of Birth
- Attending Physician
- Consulting Physicians with multiple names.
- Department
- Document Type
- Date of Document
- Signature

Login:

User Access rights and user type is defined.

- Each user will have login name and password.
- The password will be minimum 6 characters and must have alpha and numeric characters.
- User will have a way to change his password.
- Each user has to give an e-mail address. In case he forgets the password it can be sent to his e-mail address, only.
- Forgot password link is provided, which will initiate an e-mail sending to his e-mail address.





User has to change his initial password within 8 hours else it will expire.

For each user, there are:

- User Name
- Password
- Type (Physician/ER/Records/Billing)

Access Types:

Access types are constraints for users. They define how different types of users can access the records and what type of functioning they can perform on records.

- Physicians will have access to all the records of all patients. They can change patient's records later. They will not have print/copy right.
- ER will always have access to all the records, all the times. They can print it but not copy it.
- Records will have right to print/copy records.
- Billing will have right to see all records, but no print or copy right.

Record Selection:

Different search criteria that will help the user.

- First patient name is to be selected.
- There are chances that there will be more than one patient with the same name, in that case name and DOB is to be shown, so that right patient is selected.
- Calendar is provided for date selection.
- List of document types is available for this patient, with a check box for each item.
- User can select document types. Selection and deselecting for all document types is provided.
- Based on patient name, Date range and Document types defined above, list of documents matching are shown.
- Toggle for list and documents are provided.
- Once the list is in front of the user, and if he can look any document from the list by double clicking on the row.



Following tabs are provided on the document display screen:

- Page within Document: Next page/Previous page/first page/Last page.
- Image control: Zoom-In/Zoom-Out/Rotate/Fit to Page/Fit to Width/Fit to Height.
- Document control: Next Document/Previous Document.
- Special Tab is provided to go back to the list.

Security:

Security provides protection of data against unauthorized access.

1. If there is inactivity for more than 3 minutes, the user is to be logged off.
2. No right click or print screen permission.
3. For every user logged in, the criteria for accessing records will be logged.
4. An Audit trail is provided that reports user and patient whose record was accessed.
5. The communication between the server and the user computer is secured by 128bit encryption.

Electronic Signature:

The electronic signature is designed to identify the doctor that appends the signature and to indicate his/her agreement to the content of a patient document in the same way as a handwritten signature.

- Until the document is signed off, it is not presented to anyone, except the physician who has to sign it.
- At the login time tab is provided to see if there are any documents waiting for the user to sign.
- Once the user clicks this tab, list of documents waiting to be signed is displayed. User is able to view the document.
- Option is provided to indicate whether the document is accepted or rejected.
- User name, Date and time of accepted document will be stored as electronic signature and no one can edit or delete it.
- If the document is rejected, the records department can get a list of documents rejected.
- Administrator is able to get a report indicating reports that were rejected with note, so that it can be fixed and resubmitted.



About Bulwark Systems Development Labs

Bulwark Systems Development Labs is a Technology intensive Software Development facility that brings cutting edge business critical software solutions for its clients.

The Development Team Talent Pool consists of professionals including Industry Experts, Business Administrators, Business Analysts, Project Coordinators and Programmers. We cater to the following verticals

- Healthcare
- Manufacturing
- Enterprise Computing
- Business Process Outsourcing

Bulwark Systems is backed by a strong management team that understands, analyzes and ensures the delivery of the client's vision.