

Phase 8: Data Management & Deployment

Project: Hospital Management System CRM

Step 1: Duplicate Management

Prevent duplicate Patient records (by Email/Phone/Name) and surface potential duplicates during data entry or import to maintain patient safety and data integrity.

1) Create the Matching Rule

1. **Setup** → **Quick Find** → **Matching Rules** → **New Rule**
2. **Object:** Patient (Patient__c)
3. **Rule Name:** HMS_Patient_Email_Phone_Match
4. **Add Matching Criteria:**
 - **Field** = Email → **Matching Method** = Exact
 - **Click Add Row** → **Field** = Phone → **Matching Method** = Exact
 - **Click Add Row** → **Field** = Patient Name → **Matching Method** = Fuzzy (to catch similar names)
5. **Save** the rule
6. **Click Activate** (only active rules can be used by Duplicate Rules)

The screenshot displays the Salesforce Setup interface for creating a Matching Rule. The browser address bar shows the URL: `orgfarm-9ccf877550-dev-ed.develop.lightning.force.com/lightning/setup/MatchingRules/page?address=%2F0JdgK000004CKGP`. The left sidebar shows the navigation menu with 'Setup' selected, and 'Duplicate Management' > 'Matching Rules' highlighted. The main content area is titled 'Matching Rules' and shows the details for a rule named 'Doctor Matching rule'. The rule is currently 'Inactive'. The matching criteria are defined as: (Doctor: Name EXACT MatchBlank = TRUE) AND (Doctor: Specialization EXACT MatchBlank = TRUE). The rule was created by Sowmya Panithi on 9/26/2025 at 12:06 AM. The interface includes buttons for 'Edit', 'Delete', 'Clone', and 'Activate'.

Matching Rule Detail	
Object	Doctor
Rule Name	Doctor Matching rule
Unique Name	Doctor_Matching_rule
Description	Matches doctor by name and specialization
Matching Criteria	(Doctor: Name EXACT MatchBlank = TRUE) AND (Doctor: Specialization EXACT MatchBlank = TRUE)
Status	Inactive
Created By	Sowmya Panithi, 9/26/2025, 12:06 AM
Modified By	Sowmya Panithi, 9/26/2025, 12:06 AM

2) Create the Duplicate Rule

1. **Setup** → **Quick Find** → **Duplicate Rules** → **New Rule**
2. **Object:** Patient
3. **Rule Label:** HMS_Patient_DuplicateRule
4. **Under Matching Rules**, click **Add** and select the HMS_Patient_Email_Phone_Match matching rule
5. **Action on Create:** Choose **Alert** (start in Alert mode while testing)
6. **Action on Edit:** Choose **Alert**
7. **(Optional) Scope:** Set record types or profiles for medical staff only
8. **Save**, then click **Activate**

Screenshot Reference: Duplicate Rule configuration

3) Doctor Duplicate Prevention

Matching Rule for Doctors:

- **Object:** Doctor (Doctor__c)
- **Rule Name:** HMS_Doctor_License_Match

The screenshot shows the Salesforce 'Duplicate Rules' configuration page for a 'Patient Duplicate Rule'. The page is titled 'Duplicate match rule' and includes a 'Back to List: Email Alerts' link. The 'Duplicate Rule Detail' section contains the following information:

Field	Value
Rule Name	Duplicate match rule
Description	
Object	Patient
Record Level Security	Enforce sharing rules
Action On Create	Allow
Operations On Create	Alert <input checked="" type="checkbox"/> Report <input checked="" type="checkbox"/>
Action On Edit	Allow
Operations On Edit	Alert <input checked="" type="checkbox"/> Report <input type="checkbox"/>
Alert Text	Use one of these records?
Active	<input type="checkbox"/>
Matching Rule	<input checked="" type="checkbox"/> Patient match rule <input checked="" type="checkbox"/> Mapped
Matching Criteria	(Patient: Gender EXACT MatchBlank = FALSE) AND (Patient: Name EXACT MatchBlank = FALSE)
Conditions	
Created By	Sowmya Panthi, 9/26/2025, 1:18 AM
Modified By	Sowmya Panthi, 9/26/2025, 1:18 AM

The page also includes buttons for 'Edit', 'Delete', 'Clone', and 'Activate' at the top and bottom of the rule details section. The left sidebar shows the navigation menu with 'Duplicate Rules' selected. The bottom of the page shows the Windows taskbar with various application icons and the system clock.

- **Matching Criteria:** Medical License Number (Exact), Email (Exact)
- **Purpose:** Prevent duplicate doctor registrations

Step 2: Data Backup

Healthcare Data Backup Process

Steps:

1. **Setup → Quick Find → Data Export → Data Export**
2. **Choose backup type:**
 - **Export Now** → Run immediate medical data backup
 - **Schedule Export** → Set weekly/monthly automated backups for compliance
3. **Select Healthcare Objects:**
 - **Patient** (critical patient demographics and medical history)
 - **Doctor** (provider information and credentials)
 - **Appointment** (scheduling and treatment records)
 - **Medical Records** (if implemented)
 - **Standard Objects:** Users, Profiles, Permission Sets
4. **Click Start Export** (for immediate) or **Save** (for scheduled)
5. **Wait** → Salesforce emails when backup is ready
6. **Download** the .zip file → extract CSV files
7. **Store securely** (encrypted drive, HIPAA-compliant storage, secure cloud)

The screenshot displays the Salesforce Monthly Export Service interface. At the top, there's a navigation bar with the Salesforce logo and a search bar. The main heading is 'Monthly Export Service'. Below the heading, a paragraph explains the service: 'Data Export lets you prepare a copy of all your data in salesforce.com. From this page you can start the export process manually or schedule it to run automatically. When an export is ready for download you will receive an email containing a link that allows you to download the file(s). The export files are also available on this page for 48 hours, after which time they are deleted.'

The 'Next scheduled export' section shows 'None'. Below this, there are two buttons: 'Export Now' and 'Schedule Export'. The 'Schedule Export' button is highlighted. Underneath, the export details are listed: 'Scheduled By' is 'Sowmya Panithi', 'Schedule Date' is '9/26/2025', and 'Export File Encoding' is 'ISO-8859-1 (General US & Western European, ISO-LATIN-1)'. A table at the bottom shows the export file details:

Action	File Name	File Size
download	WE_00DgK00000BplcTUAW_1.ZIP	1.1K

AutoSave Off Appointment_C - Read-Only Search

File Home Insert Draw Page Layout Formulas Data Review View Help

Paste Copy Format Painter Clipboard Font Font Size Alignment Number Styles Cells Editing Add-ins

POSSIBLE DATA LOSS Some features might be lost if you save this workbook in the comma-delimited (.csv) format. To preserve these features, save it in an Excel file format. Don't show again Save As...

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3		K0000	005gK0000	0	Id-0002	#####	005gK0000	#####	005gK0000	#####	a03gk00000CF	#####	4000									
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