



A division of ACCESS Health International

Microservice Specification (Functional)

‘Patient Registration’



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1. Functional Area- Patient Registration

2.1 Purpose

This document describes the Business Requirements Specifications (BRS) for Patient Registration in a primary care and specialist care setting.

2.2 Intended Audience

This document is intended for the Product Engineering team to commence development of ‘Registration’ microservice and the audience would comprise of

- 1.5.1 Development, Design & Implementation Team which may include Architects, Designers, Developers, and Business Analysts
- 1.5.2 Key stakeholders in the government at central and state levels

2.3 Overview

This microservice deals with various functionalities for managing patient registration for primary care and specialist care setting. Patient registration is an important and critical process to initiate patient care by a healthcare provider.

2.4 Scope & Not in Scope

Functionality scope includes:

- New Patient Registration (Cash Patient)- walk-in
- New Patient Registration- online portal - temporary registration
- New Patient Registration- telephonic/call center- temporary registration
- Bulk Registration -community care, camps and corporate checkups - temporary registration
- Deactivation of Registration
- Updating new information
- Patient Lookup
- Merging of Records

2.5 New Patient Registration

1.5.1 Business Process Flow for New Patient Registration - Walk In

Description	<p>Patient registration is the primary process of uniquely identifying a new patient who wants to get a service rendered by a healthcare facility.</p> <p>As per National Digital Health Blueprint there will be a National-level Patient Registry or National Patient Master Index that will identify each patient uniquely and will store a Unique Health identification number (UHID) to facilitate creation of longitudinal EHR/PHR framework in India.</p> <p>There are two ways a patient can be identified uniquely across facilities-</p> <ol style="list-style-type: none"> 1. Through a look up API that a facility can use to connect to National Master Patient Index/ National Patient Registry (NDHB recommended) to retrieve and link patient’s UHID during new patient registration process. This will be applicable once the National Patient registry is available to use. The API should also have a capability to retrieve patient’s demographics or at least should be able to authenticate demographics that were captured by the facility during a new registration for a patient. <p>Or</p> <ol style="list-style-type: none"> 2. Until we have a National Patient Registry available at central level, all the health delivery information systems (HDIS) should have a placeholder for UHID and a built-in technical capability for federated identification Number Management. The application should be able to link the UHID placeholder to patient’s multiple existing IDs like facility local ID or a program specific ID (NIKSHAY ID, RCH ID).
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	A deduplication mechanism is required to be implemented using ADHAAR based authentication. The UHID will serve as “primary key” throughout a patient lifecycle across healthcare facilities.
Users	OP Reception Clerk, OP Billing Clerk, Nurse, Doctor, Patient
Pre-requisites	None
Business Process Details	<p>A new patient registration process involves generation of a unique identifier for the patient against which patient details like demographics, billing details etc are captured. The information captured during a patient registration is then stored in patient master index of the application that it can be retrieved as in when required for patient billing or patient care.</p> <p>The identifier will be used every time the patient is going to make subsequent visits to the facility. It will span across various clinical and non-clinical areas of the facility and will act as primary key for continuity of patient care within the facility. With bringing in UHID based federated patient identity management as recommended by NDHB ,patient care can be coordinated across facilities and states and portability can be implemented across the country. UHID is critical from the point of view of Universal health coverage i.e PMJAY based care coordination.</p> <p>A new patient registration covers -</p> <ul style="list-style-type: none"> • Cash patient registration • Insurance registration • Corporate patient registration <p>As shared above, patient registration is to capture three important sets of information: unique patient identifier (national/ local), demographics and insurance/ billing details. Demographics are important to identify the location & contact details of a patient/ family for further correspondence. Information related to insurance/ billing may include patient category (cash, corporate, insurance) and sub-category (BPL, Senior Citizen); and insurance related information like insurance type, policy ID, etc.</p>
Steps	<p>Registry Lookup API</p> <ul style="list-style-type: none"> • When a new patient is to be registered a registry lookup API will be needed to get patient demographic details from the National Patient Registry/ national Patient Master Index. • A user can use the lookup API either using combination of patient’s demographics to retrieve the UHID or if patient knows his/her UHID that can be entered to query the National Patient Master Index for patient demographics and Insurance details. (UHG relevant details). • Lookup API specification are provided in later part of the document. <p><i>Lookup API recommended steps</i></p> <ul style="list-style-type: none"> • Open the Registration service page for new patient and uses the look up service provided by the National Master Patient Index to search patient either by his/her UHID or combination of demographics. • Once UHID is found, sends an authentication request to link the unique health identification number. <p>Deduplication Mechanism</p> <ul style="list-style-type: none"> • A registration module/microservice should have a deduplication mechanism that can prevent duplicate record creation for the same patient. • An ADHHAR token-based authentication can be used till we have UHID in place at National level. • Combination of patient’s demographic parameters can be used for creating the deduplication script that will run in the background while a patient registration is in progress. • Once UHID is made available Nationally a UHID can be used to confirm if same patient already exists in the information system or not. <p><i>Deduplication recommended steps</i></p> <ul style="list-style-type: none"> • OP registration user opens the registration screen to start the new registration. • User enters the UHID provided by the patient, if patient with the same UHID exists, system sends an alert to the user “patient is already registered”.

	<ul style="list-style-type: none"> In cases where patient does not remember the UHID, the user enters patient details, system does a deduplication check in the local system with the information provided for any existing patient with same details. Deduplication can be done by using permutation-combination of patient information to build a deduplication logic. <p>Capturing Relevant Patient Information</p> <ul style="list-style-type: none"> Post UHID retrieval patient demographic details can be retrieved from the National Patient registry if permitted Details that are not available in the patient master index can be recorded by the user which may include demographics, family details, billing/ insurance details, referral details, etc. System automatically validates the information added on pre-defined rules for registration. On successful validation a new patient is registered in the system and if needed a unique local patient identifier is generated which will be linked to patient's UHID. Registration details can be sent to patient's mobile number/email ID. A patient registration card can be generated if required.
Outputs	<ul style="list-style-type: none"> Provider's Patient ID Local (optional) Patient Card - optional Email/ WhatsApp/ SMS Patient details captured against UHID
Messages & Alerts	<ul style="list-style-type: none"> System alert for gaps on mandatory fields & validation errors System alert if the patient is not a new user Message to relevant provider/ department for a new patient registration Message to patient/ family member for registration

1.5.2 Business Process Flow for New Patient Registration - Online Portal - temporary registration

Description	<p>Nowadays as patients are more informed, concerned about their health, and having internet access everywhere, a patient portal becomes important to do smaller transactions like online appointment, online registration, etc.</p> <p>Time being a major constraint especially for working individuals in urban settings, a patient may want to skip the physical registration process, waiting time and queues at a facility. Similarly, for a facility, time management, patient scheduling and resource management are critical processes. Hence, online registration has become a value-added service for the patient to reduce waiting; and for the clinic to understand the inflow of patients in advance.</p> <p>Online patient registration is the primary process for self-registering on an online portal by providing their unique health identification number or AADHAR number (in case the unique health identification number is not available). It is vital for the facility to receive the information to then deduplicate/ validate the identification number and register the patient when they visit. The online patient registration will create a temporary ID for the patient.</p> <p>Along with the unique health identification number, patient's demographic details and insurance/ billing information may also be taken on the online portal. These are critical to provide appropriate treatment/ care; and to ensure proper and prompt payment of bills or settlement of claims.</p>
Users	Patient
Pre-requisites	<ul style="list-style-type: none"> A universal patient portal linked to the facility should exist or A patient portal of the facility should exist Patient should have internet access
Business Process Details	<p>An online patient registration process involves capturing bare minimum patient details on the online portal that may include capturing patient's demographics and minimum insurance/ billing details along with their unique health identification number if available.</p> <p>An online registration should not interfere with the facility's registration system. Hence, online registration should create a different series of patient ID which can be a temporary ID. This is important because many</p>

	<p>a times a patient may register online but never turnup. An online registration should only be a tool to extract patient information from the portal that is required to complete a patient registration when he/she physically visits the facility to save time in asking all the information again.</p> <p>Though online registration streamlines patient processes, but it is effective only if it is in continuous synchronization with the walk-in registrations happening at the facility.</p> <p>An online patient registration covers -</p> <ul style="list-style-type: none"> • Cash patient registration • Insurance registration • Corporate patient registration <p>As shared above, online patient registration is to capture three important sets of information: unique health identification number (NDHB recommended placeholder), demographics and insurance/ billing details and an alternate ID of patient from the pre-defined value sets. Demographics are important to identify the location & contact details of a patient/ family for further correspondence. Information related to insurance/ billing may include patient category (cash, corporate, insurance) and sub-category (BPL, Senior Citizen); and insurance related information like insurance type, policy ID, etc.</p>
Steps	<ul style="list-style-type: none"> • A new patient visits the universal online portal or to the online portal of the desired facility • Patient clicks on registration and opens the page. The page will have spaces for filling the unique health identification/alternate IDs if any, demographic details and insurance/ billing details, family details, etc. • On patient submission system validates the added information as per the predefined business rules and meta data standard rules before saving. • a temporary patient ID is generated. • An SMS/ WhatsApp/ Email alert can be sent to the patient and a system alert will be sent to the relevant facility
Outputs	<ul style="list-style-type: none"> • Patient-temporary ID • Email/ WhatsApp/ SMS • System Alert
Messages & Alerts	<ul style="list-style-type: none"> • System alert for gaps on mandatory fields & validation errors • System alert if the patient is not a new user • Message to relevant facility for a new online patient registration • Message to patient/ family member for new online registration

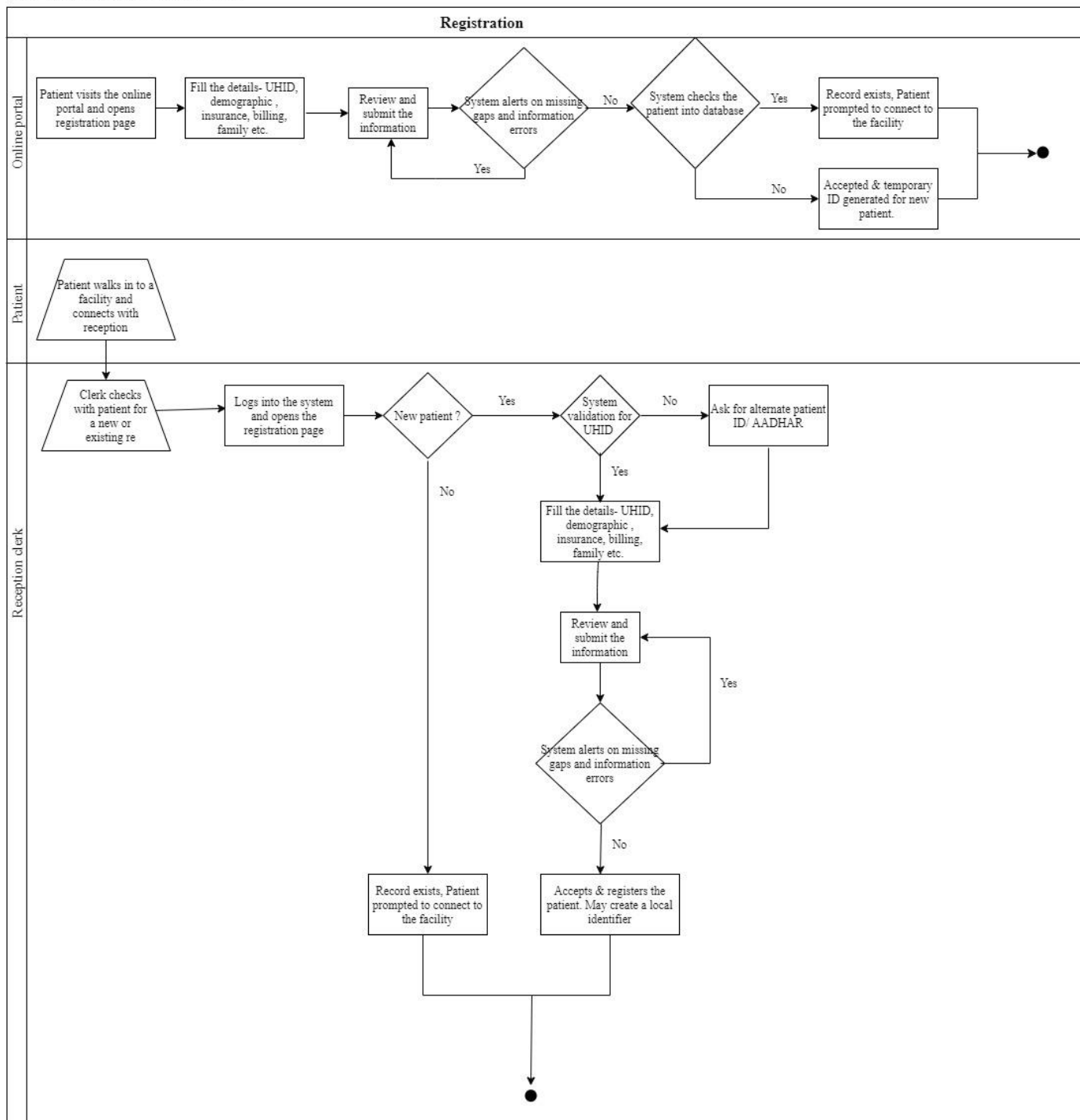
1.5.3 Business Process Flow for New Patient Registration - telephonic/ call center - temporary registration

Description	<p>Telephonic/ call center registration is useful for patients who may call up either a universal helpline or call center of a facility or the facility's reception desk to enquire about a service they are looking for. Alternatively, it may also be useful for patients who may have registered on the online portal but have limited internet access.</p> <p>Receptionist or call center personnel temporarily registers a patient over call and capture the unique health identification number, patient's demographic details and insurance/ billing information.</p> <p>Telephonic patient registration is the process for assisted temporary registration through a universal helpline or call center of a facility or the facility's reception desk, It is vital for the facility to receive the information to then deduplicate/ validate the identification number and register the patient when they visit. The telephonic/ call center patient registration will create a temporary ID for the patient.</p> <p>Along with the unique health identification number, patient's demographic details and insurance/ billing information may also be taken. These are critical to provide appropriate treatment/ care; and to ensure proper and prompt payment of bills or settlement of claims.</p>
Users	Patient, Call Center Personnel, Registration Clerk or Receptionist
Pre-requisites	Internet connectivity

	<p>Integration with the facility registration system</p> <p>Capability to generate a different series for temporary registration</p>
Business Process Details	<p>A telephonic/ call center patient registration process involves capturing patient details on the online portal by the call center personnel or registration clerk or receptionist under the "Registration Service Area" that includes capturing patient demographics and insurance/ billing details along with their unique health identification number.</p> <p>The patient registration details will then be used for deduplication of the identification number by the facility and then registering them when they visit.</p> <p>A telephonic/ call center registration should not interfere with the facility's registration system. Hence, telephonic/ call center registration should create a different series of patient ID which can be a temporary ID. This is important because many a times a patient may register over a call but may never turn up. A telephonic/ call center registration should only be a tool to extract patient information in advance that may be required to complete a patient registration when he/she physically visits the facility to save time in asking all the information again.</p> <p>Though telephonic/ call center registration streamlines patient processes, but it is effective only if it is in continuous synchronization with the walk-in registrations happening at the facility.</p> <p>A telephonic/ call center patient registration covers -</p> <ul style="list-style-type: none"> • Cash patient registration • Insurance registration • Corporate patient registration <p>As shared above, telephonic/ call center patient registration is to capture three important sets of information: unique health identification number, demographics and insurance/ billing details. Demographics are important to identify the location & contact details of a patient/ family for further correspondence. Information related to insurance/ billing may include patient category (cash, corporate, insurance) and sub-category (BPL, Senior Citizen); and insurance related information like insurance type, policy ID, etc.</p>
Steps	<ul style="list-style-type: none"> • Patient calls up either a universal helpline or call center of a facility or the facility's reception desk. • The call center personnel or registration clerk or receptionist opens the registration screen and asks for patient's demographic details & billing details. • On submission system performs validation check as per the business rules and meta data standard rules for information that was filled. On successful validation, system will generate a temporary patient ID • An SMS/ WhatsApp/ Email alert will be sent to the patient and a system alert will be sent to the relevant facility
Outputs	<ul style="list-style-type: none"> • Patient ID - temporary • Email/ WhatsApp/ SMS • System Alert
Messages & Alerts	<ul style="list-style-type: none"> • System alert for gaps on mandatory fields & validation errors • System alert if the patient is not a new user • Message to relevant facility for a new telephonic/ call center patient registration • Message to patient/ family member for new online registration

1.5.4 Visio Diagram- Patient Registration

1.5.4. Process Flow-Registration- Visio



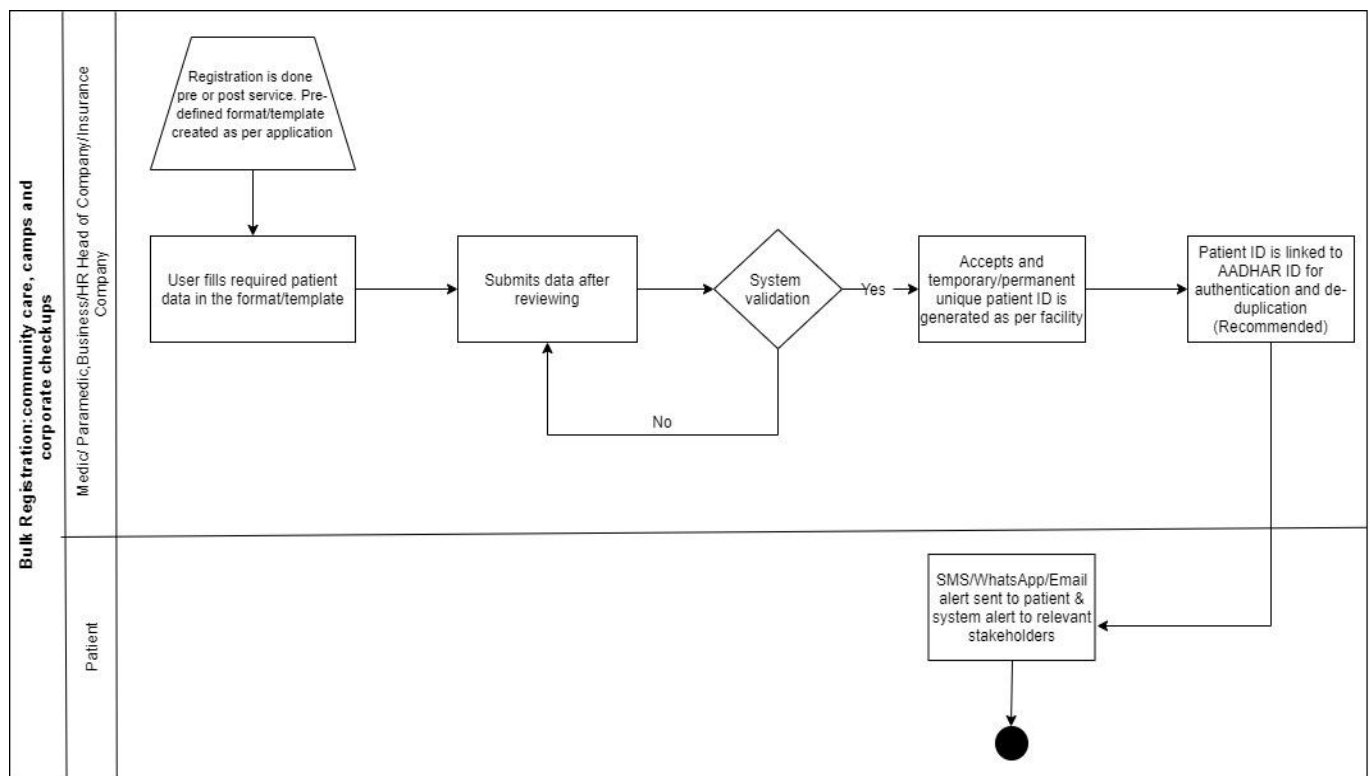
2.1 Bulk Registration

2.1.1 Business Process Flow for Bulk Registration - community care, camps and corporate checkups - temporary registration

Description	<p>Bulk registration gain importance in scenarios where there is high patient flow which is relatively fixed in nature like communities/ camps/ companies/ housing societies, etc. In such population groups, on spot registration may be time consuming especially when the services are to be delivered in groups or there is an option to bulk register people.</p> <p>Bulk registration is the process for uniquely identifying multiple patients belonging to a common population group like a community, housing society or company. The healthcare medic/ paramedic in charge of bulk registration would capture the patient's unique health identification number (AADHAR ID if UHID is not available) in an excel in predefined format, along with their demographic details, screening details for common health issues, and insurance/ billing information. These are critical to provide appropriate treatment/ care; and to ensure proper and prompt payment of bills or settlement of claims.</p> <p>In case, the company is collecting the information, a pre-designed excel sheet/ form may be sent to the business/ HR head who may then collect and share the information with relevant stakeholders. In such a case, screening details won't be captured.</p> <p>It is vital for the facility to receive the information to then deduplicate/ validate the identification number and register the patient when they visit. The bulk registration will create a temporary ID for each patient.</p>
Users	Medic/ Paramedic, Business/ HR Head of a company, Insurance Company, Patient
Pre-requisites	<ul style="list-style-type: none"> • Bulk upload functionality • A predefined format for patient registration detail upload • Pre/Postdated registration capability
Business Process Details	<p>Bulk registration process involves capturing details of multiple patients through an excel import by the medic/ paramedic under the "Registration Service Area" that includes capturing patient demographics, screening details for common health issues and insurance/ billing details along with their unique health identification number.</p> <p>Each patient registration details will then be used for deduplication of the identification number by the facility and then registering them when they visit.</p> <p>Bulk registration should not interfere with the facility's registration system. Hence, bulk registration should create a different series of patient IDs which can be temporary IDs. This is important because patients may register during bulk registration but may never need/ seek services. Bulk registration is only a tool to extract patient information in advance that may be required to complete a patient registration when he/she physically visits the facility to save time in asking all the information again.</p> <p>Bulk registration covers -</p> <ul style="list-style-type: none"> • Community groups • Insurance registration • Corporate patient registration <p>As shared above, bulk registration is to capture three important sets of information: unique health identification number, demographics, screening details of common health issues and insurance/ billing details. Demographics are important to identify the location & contact details of a patient/ family for further correspondence. Information related to insurance/ billing may include patient category (cash, corporate, insurance) and sub-category (BPL, Senior Citizen); and insurance related information like insurance type, policy ID, etc. Since a large number of patients are gathered for bulk registration, screening details of common health issues can be easily captured.</p> <p>In case, the company is collecting the information, screening details won't be captured.</p>
Steps	<ul style="list-style-type: none"> • A bulk registration can be done prior as well as post a service was provided to a patient group, as it is mostly used for camps and community service delivery. A pre-defined format/template can be created as per the application in use.

	<ul style="list-style-type: none"> Responsible user fills in required patient data in the template which has optional and mandatory fields. The template is then uploaded with all the patient details. System performs basic validation check as per the business rules and meta data standards. On successful validation patients are registered and can have a temporary or permanent unique ID as per the facility. It is recommended to link patient's ADHAAR ID for authentication and deduplication as storing of ADHAAR ID is not permitted. An SMS/ WhatsApp/ Email alert can be sent to the patient and a system alert will be sent to the relevant stakeholders.
Outputs	<ul style="list-style-type: none"> Patient ID – temporary/permanent Patient Card - optional Email/ WhatsApp/ SMS
Messages & Alerts	<ul style="list-style-type: none"> System alert for gaps on mandatory fields & validation errors Message to relevant stakeholder for bulk registration Message to patient/ family member for registration

2.1.2 Visio Diagram- Bulk Registration - community care, camps and corporate checkups - temporary registration

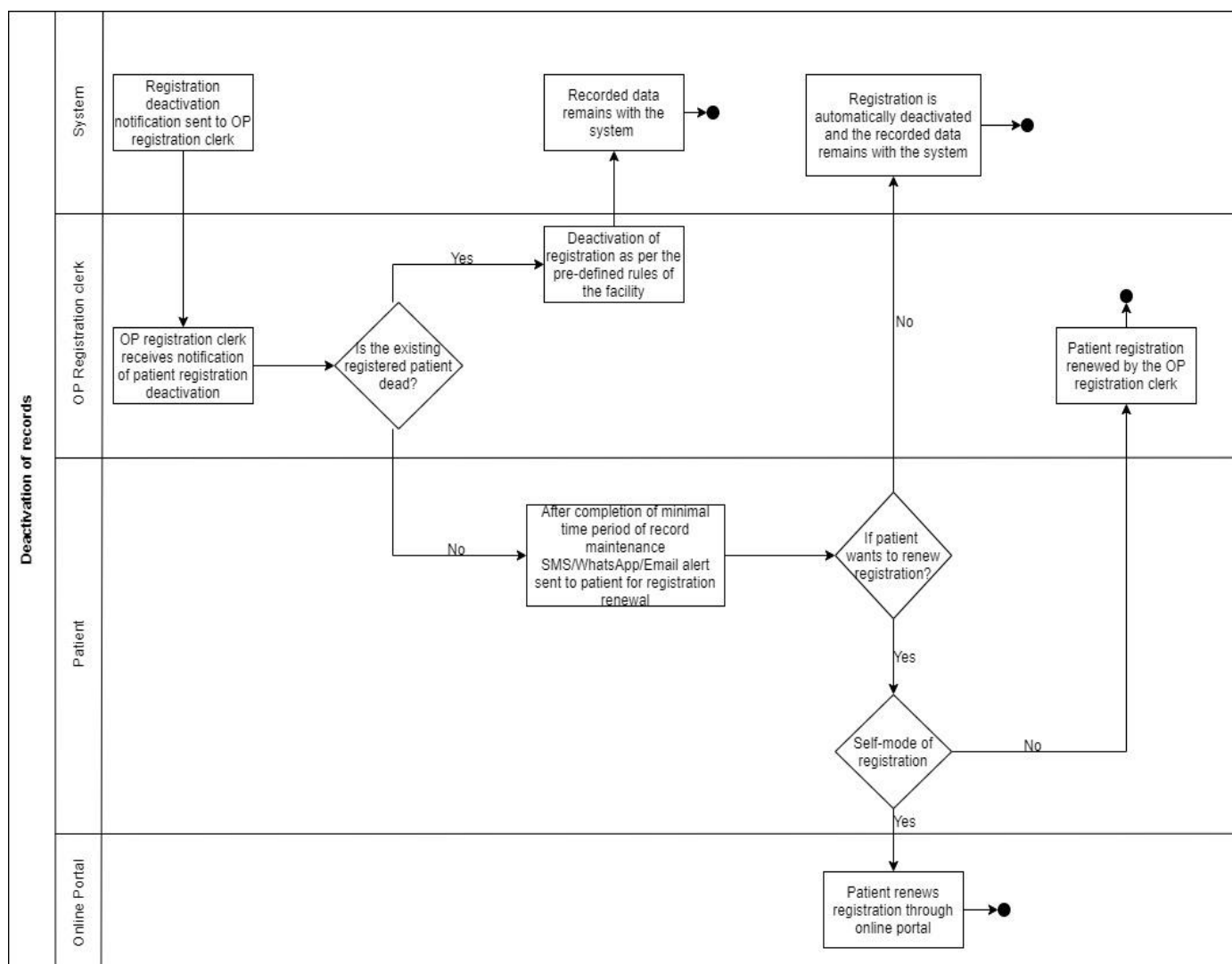


2.2 Other Processes

2.2.1 Business Process Flow for Deactivation of Record

Description	<p>Deactivation of record is usually done upon a patient's death or beyond the minimal mandatory period of record maintenance for an inactive patient. It may also be applicable if the original registration has some erroneous data.</p> <p>Minimal mandatory period may not be applicable to outreach registrations, as the covered population is usually registered under a field worker or the lowest facility for prospective services in the future.</p>
Users	OP Reception Clerk
Pre-requisites	<p>Patient is registered</p> <p>Patient's Unique ID</p> <p>Business rule that requires deactivation</p>
Business Process Details	<p>Upon intimation of a patient's death or upon a pop up of an expiry of the minimal mandatory period of record maintenance of an inactive patient, the registration may be deactivated. A rule engine may be set for the minimal limit</p> <p>Minimal mandatory period may not be applicable to outreach registrations, as the covered population is usually registered under a particular field worker or the lowest facility for prospective services in the future.</p>
Steps	<ul style="list-style-type: none"> • OP reception clerk receives information on an existing patient's death or a notification in the 'Registration Service Area' for an expired registration as per the predefined business rules of the facility against a Unique ID of the patient record in question • Deactivates the registration (a backend audit trail will be maintained in the system for the deactivated record) • In case of an expiry of the minimal time period of record maintenance, the patient will receive an SMS/ WhatsApp/ Email alert upon deactivation and to re-register himself for continued services.
Outputs	<ul style="list-style-type: none"> • Deactivated patient record • Maintained audit trail for start and end of registration and user details • Email/ WhatsApp/ SMS (Optional)
Messages & Alerts	Message to relevant stakeholder upon deactivation of patient record

2.2.2 Visio Diagram- Deactivation of Record

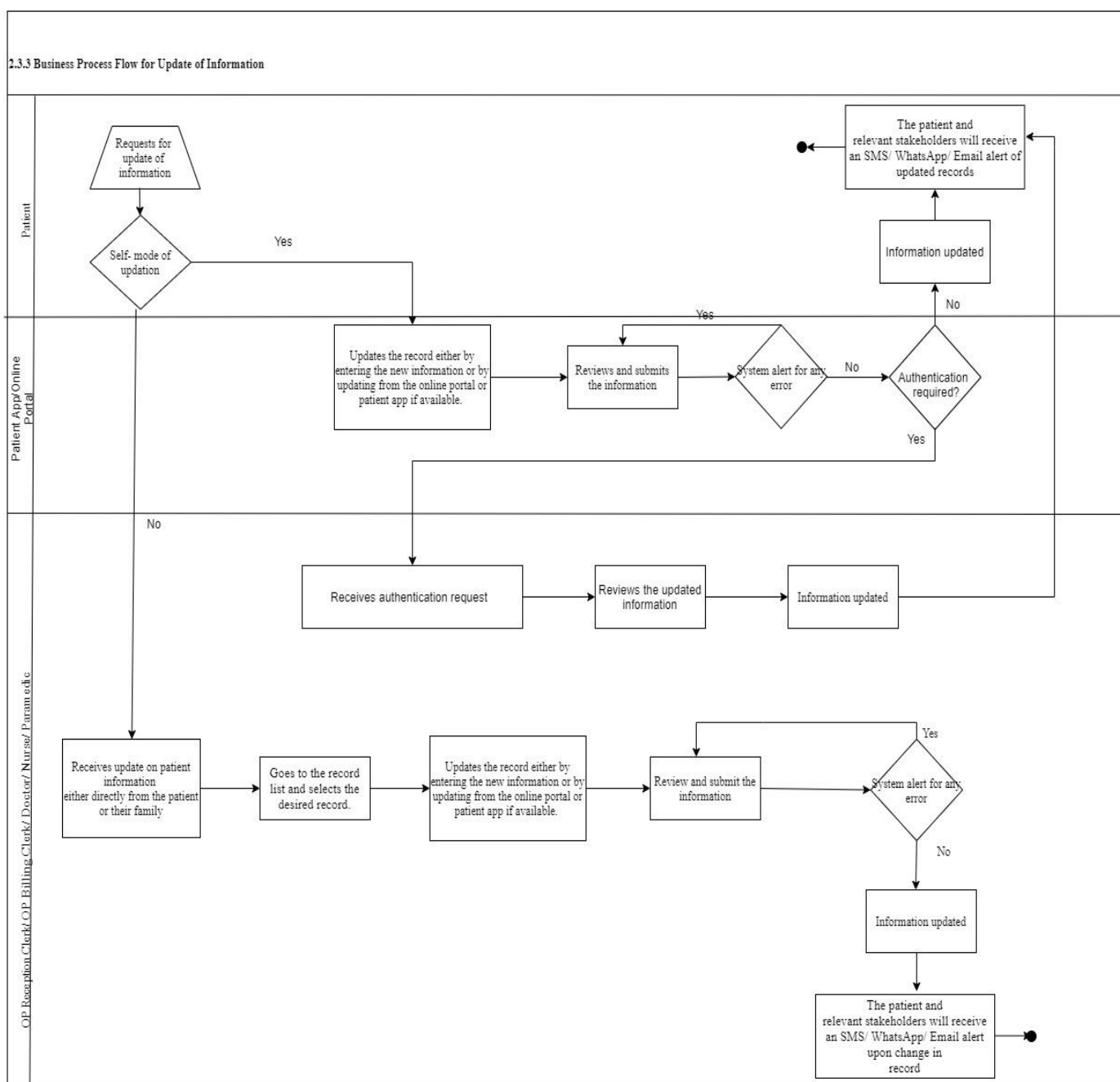


2.2.3 Business Process Flow for Update of Information

Description	Update of a patient information is needed when there is a change in their demographic details or insurance/ billing details.
Users	OP Reception Clerk, OP Billing Clerk, Patient, Doctor, Nurse, Paramedic
Pre-requisites	Existing registration
Business Process Details	<p>In the event of a change in the demographic details of a patient or their insurance/ billing details; the reception clerk or the billing clerk or the attending patient's doctor/ nurse/ paramedic may update the new information on the patient's record.</p> <p>Alternatively, the patient themselves can update their information on the online portal or may telephone the call center or reception desk to update the information.</p>
Steps	<ul style="list-style-type: none"> OP reception clerk receives update on patient information either directly from the patient or their family, or through the online portal Goes to the record list and selects the desired record. Updates the record either by entering the new information or by updating from the online portal or patient app if available Reviews the selected record and check for validation errors if any

	<ul style="list-style-type: none"> The patient and relevant stakeholders will receive an SMS/ WhatsApp/ Email alert upon change in record
Outputs	<ul style="list-style-type: none"> Update on patient record Email/ WhatsApp/ SMS
Messages & Alerts	<ul style="list-style-type: none"> System alerts for validation errors Message to relevant stakeholder upon update of patient record Message to patient/ family member upon update of patient record

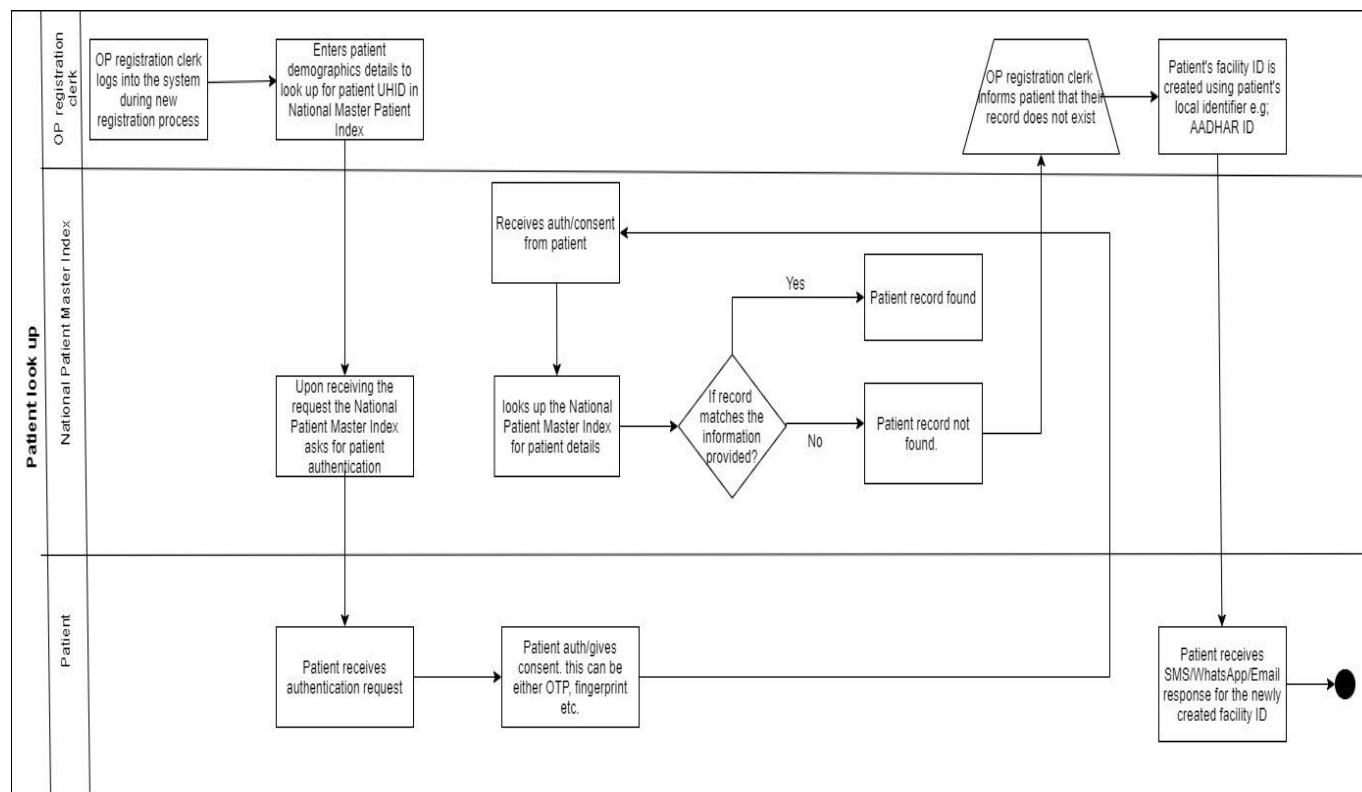
2.2.4 Visio Diagram- Patient Information Update



2.2.5 Business Process Flow for Patient Look-up

Description	<p>Patient Look-up may be needed in multiple scenarios as listed below-</p> <ul style="list-style-type: none"> to look up for patient's unique health identification number from National Master Patient Index; To authenticate patient demographics provided by the patient with the data in the National Patient master index or to extract patient demographics from patient master index using a UHID and patient consent. A patient lookup can also be used to internally look for an existing record for the patient.
Users	OP Reception Clerk
Pre-requisites	<p>UHID- Patient record is present in the National Patient Master Index</p> <p>Patient Consent</p>
Business Process Details	<p>A standard API should be used for patient Registry lookup that will connect with the National Master Patient Index or Registry and fetch required data.</p> <p>The API should be able to query minimum information that includes "Patient's UHID" based on patient's alternate IDs which can be ADHAAR no., of license no. or any other government recommended IDs.</p> <p>An API can also be used to authenticate user captured patient demographics to the demographics stored by the National Patient Master Index and also facilitates requesting facility's ID/provider ID and details for authentication.</p> <p>The lookup API if permitted should return patient basic information with patient consent to a hospital for a new patient registration.</p> <p>In the event of a new registration, the patient's unique health identification number needs to be looked up to uniquely identify the patient and then link up the demographic details and insurance/ billing details to complete the registration.</p> <p>Upon looking up the unique health identification number, the facility may also want to look up for an existing record to avoid duplication.</p>
Steps	<ul style="list-style-type: none"> OP reception clerk logs into the system during a new registration process and looks up in the National Master Patient Index for unique health identification number using the demographics provided by the patient. For authenticating the user intent who is trying to use the lookup service Registry asks for OTP or any other way like fingerprint etc that can capture patient auth/consent (Patient Consent based authentication) The national patient master index sends a response if a record matches the information provided. Uses the authentication service to link the UHID for the new patient registration. For the scenarios where a matching record was not found a response is sent back to the API query. Facility may want to reconfirm the patient details or mention this against patient's local Facility ID on successful registration.
Outputs	<ul style="list-style-type: none"> UHID Patient demographics Email/ WhatsApp/ SMS to the patient that his/her record was requested for consent.
Messages & Alerts	<ul style="list-style-type: none"> System alert form validation errors System alert if the patient is not a new user Message to relevant provider/ department for a new patient registration Message to patient/ family member for registration

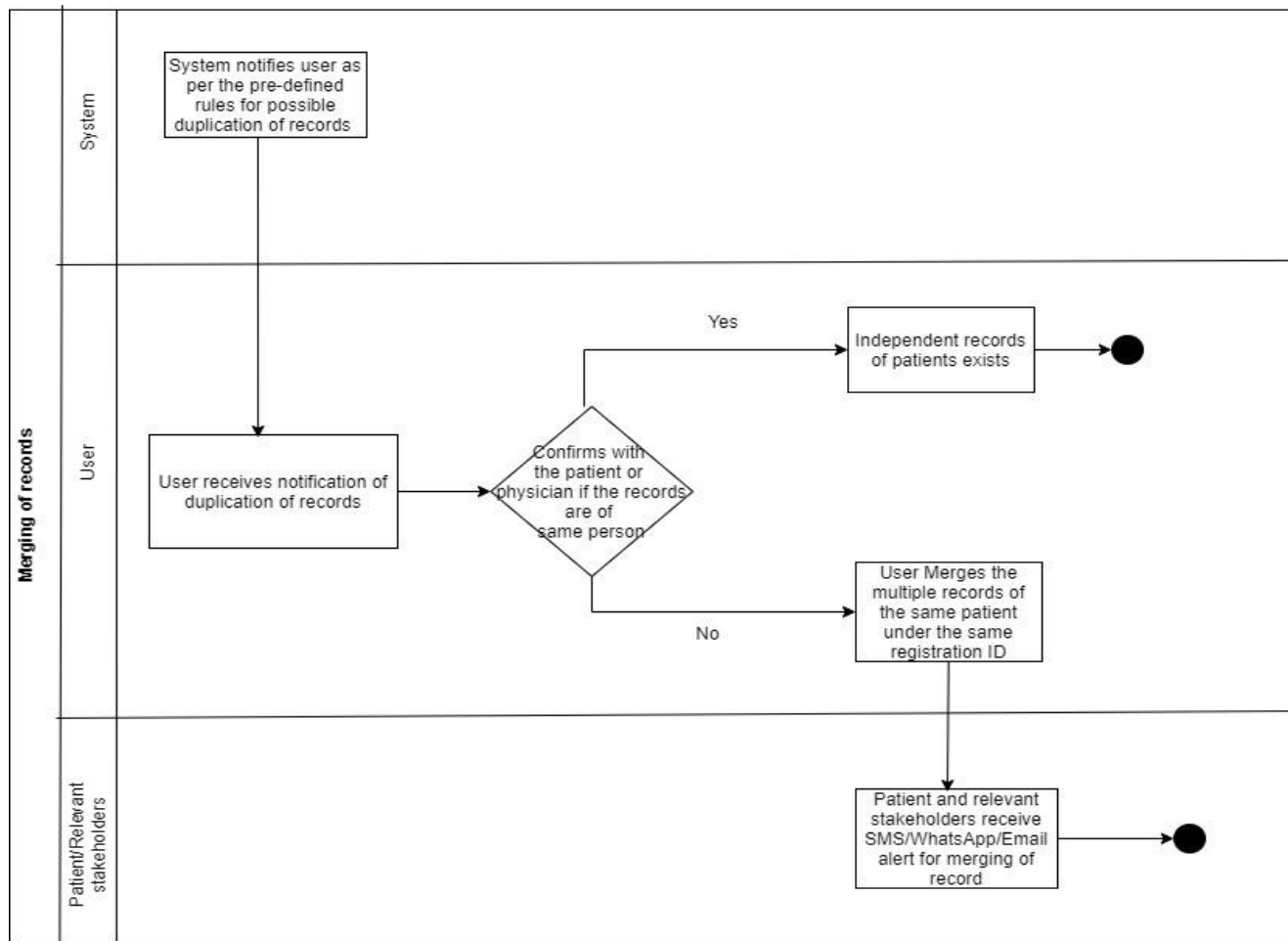
2.2.6 Visio Diagram- Patient Lookup



2.2.7 Business Process Flow for Merging of Records

Description	Merging of records is needed when two records for the patient were created due to human/system error. A rule engine for merging of records may have to be designed for this functionality that can defines rules that will highlight the records that may require merging periodically. Eg:- Android Phone book contact merge
Users	OP Reception Clerk
Pre-requisites	<ul style="list-style-type: none"> Multiple patient records exist for same patient Well defined rules for deduplication and merging of records
Business Process Details	There are scenarios where two or more records may exist for the patient due to multiple mobile number or different demographic details for the patient would have been provided at different times. In such an event, the deduplication rule engine may suggest relevant records for merging (e.g. a statistical mix of unique ID, demographic details and patient permission), and user may confirm with the patient and performs merging of multiple records.
Steps	<ul style="list-style-type: none"> User may see merge record worklist at a predefined period. User then will have to check with the patient to merge the multiple records for the same patient. There should be rules defined on which record is required to be retained as other Unique IDs may become invalid post-merger. The patient and relevant stakeholders will receive an SMS/ WhatsApp/ Email alert for the record
Outputs	<ul style="list-style-type: none"> Email/ WhatsApp/ SMS
Messages & Alerts	<ul style="list-style-type: none"> System alert for multiple records for the same patient System alert for validation errors Message to patient/ family member for record update

2.2.8 Visio Diagram- Merging of Records



3.1 Required MDDS Data Elements

3.1.1 Entity: Generic

Data Elements	MDDS Codes	Data Format	Maximum Size	Code Directory	Primary Care				Specialist Care		
					SCs	HWCs	PHCs	GP Clinics	CHCs	DHs	Hospitals
Time	05.001.0001	HH:MM:SS	8		1	1	1	1	1	1	1
Date	G00.01	dd/mm/yyyy	10		1	1	1	1	1	1	1
FIR No.	05.001.0002	Varchar	50		1	1	1	1	1	1	1
Alternate Identifier Type	05.001.0003	Integer	2		1	1	1	1	1	1	1
Alternate Identifier	05.001.0004	Varchar	254		1	1	1	1	1	1	1
Alternate Identifier Format	05.001.0005	Bytes	20		1	1	1	1	1	1	1
Comments	05.001.0007	Varchar	99		1	1	1	1	1	1	1
Healthcare Application Number	05.001.0019	Integer	5	CD05.013	1	1	1	1	1	1	1
Code System Qualifier Type	05.001.0020	Char	1		1	1	1	1	1	1	1
Code System Qualifier	05.001.0021	Varchar	15	CD05.032	1	1	1	1	1	1	1
System of Medicine	05.001.0022	Integer	2	CD05.030	1	1	1	1	1	1	1
Document ID	05.001.0023	Varchar	50		1	1	1	1	1	1	1
Reference Document ID	05.001.0024	Varchar	50		1	1	1	1	1	1	1
Non-Clinical Document Type	05.001.0025	Integer	2	CD05.034	1	1	1	1	1	1	1
Reference Document	05.001.0026	Varchar	254		1	1	1	1	1	1	1
Non-Clinical Document	05.001.0027	Varchar	4096		1	1	1	1	1	1	1

3.1.2 Entity: Person

Data Elements	MDDS Codes	Data Format	Maximum Size	Code Directory	Primary Care				Specialist Care		
					SCs	HWCs	PHCs	GP Clinics	CHCs	DHs	Hospitals
Unique Health Identification Number	G01.01	Integer	12		1	1	1	1	1	1	1
Alternate Unique Identification Number (UID) Type	05.002.0001	Integer	2	CD05.007	1	1	1	1	1	1	1

Alternate Unique Identification Number (UID)	05.002.0002	Varchar	Max. Size =18 10 - PAN Card 08 - Passport No. 18 - Voter ID 18 - Any other Identifier		1	1	1	1	1	1	1
Economic Status Code	05.002.0005	Integer	1		1	1	1	1	1	1	1
Nationality Code	05.002.0006	Integer	1		1	1	1	1	1	1	1
Multiple Birth Indicator	05.002.0007	Integer	1		1	1	1	1	1	1	1
Person Name Type	05.002.0008	Char	1		1	1	1	1	1	1	1
Phone Owner	05.002.0009	Integer	2		1	1	1	1	1	1	1
Contact Type	05.002.0010	Integer	2	CD05.054	1	1	1	1	1	1	1
Contact Person Name	05.002.0011			G01.02	1	1	1	1	1	1	1
Contact Relationship	05.002.0012	Integer	2	G01.08-01	1	1	1	1	1	1	1
Contact Person landline telephone number	05.002.0014	Varchar	8	G00.06-01-05	1	1	1	1	1	1	1
Contact Person mobile telephone number	05.002.0015	Char	10	G00.06-02-05	1	1	1	1	1	1	1
Contact Person Email Address/URL	05.002.0016	Varchar	254	G00.09	1	1	1	1	1	1	1
Author Name	05.002.0017			G01.02	1	1	1	1	1	1	1
Author Landline Telephone Number	05.002.0018	Varchar	8	G00.06-01-05	1	1	1	1	1	1	1
Author Mobile number	05.002.0019	Char	10	G00.06-02-05	1	1	1	1	1	1	1
Author Email Address/URL	05.002.0020	Varchar	254	G00.09	1	1	1	1	1	1	1
Family Member Person Name	05.002.0021			G01.02	1	1	1	1	1	1	1
Family Member Gender	05.002.0022	Char	1	G01.03	1	1	1	1	1	1	1
Family Member Relationship	05.002.0027	Integer	2	G01.08-01	1	1	1	1	1	1	1
Family Member Relationship Description	05.002.0028	Integer	2	G01.08-01	1	1	1	1	1	1	1
Family Member UID Number	05.002.0025	Integer	12	G01.01	1	1	1	1	1	1	1

Special Vulnerability	05.002.0030	Integer	2		1	1	1	1	1	1	1
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3.1.3 Entity: Patient

Data Elements	MDDS Codes	Data Format	Maximum Size	Code Directory	Primary Care				Specialist Care		
					SCs	HWCs	PHCs	GP Clinics	CHCs	DHs	Hospitals
Provider's Patient ID	05.003.0001	Varchar	18		1	1	1	1	1	1	1
Patient Name	05.003.0002			G01.02	1	1	1	1	1	1	1
Patient Age	05.003.0003	Ageyear(s) (yyy) Integer(3) AgeMonth(s) (mm) Integer(2) AgeDay(s) (dd) Integer (2) Default Value: 999,99, 99 no preceding zero [years, months , days	7		1	1	1	1	1	1	1
Identity Unknown Indicator	05.003.0007	Integer	1		1	1	1	1	1	1	1
Patient Address	05.003.0009			G02.03	1	1	1	1	1	1	1
Patient Address Type	05.003.0010	Varchar	15	G02.03-00-01	1	1	1	1	1	1	1
Patient Landline Number	05.003.0011	Varchar	8	G00.06-01-05	1	1	1	1	1	1	1
Patient Mobile Number	05.003.0012	Char	10	G00.06-02-05	1	1	1	1	1	1	1
Patient Class	05.003.0013	Integer	2		1	1	1	1	1	1	1
Patient Arrival Time	05.003.0014	HH:MM:SS	8		1	1	1	1	1	1	1
Employer ID	05.003.0020	Varchar	50		1	1	1	1	1	1	1

3.1.4 Entity: Employee

Data Elements	MDDS Codes	Data Format	Maximum Size	Code Directory	Primary Care				Specialist Care		
					SCs	HWCs	PHCs	GP Clinics	CHCs	DHs	Hospitals
Employee Name	05.004.0001			G01.02	1	1	1	1	1	1	1
Employee Telephone Number	05.004.0006	Varchar	8	G00.06-01-05	1	1	1	1	1	1	1
Employee Mobile Number	05.004.0007	Char	10	G00.06-02-05	1	1	1	1	1	1	1
Employee E-mail Address	05.004.0008	Varchar	254	G00.09	1	1	1	1	1	1	1
Employee ID	05.004.0053	Varchar	18		1	1	1	1	1	1	1
Employee Designation Code	05.004.0056	Integer	3		1	1	1	1	1	1	1

3.1.5 Entity: Source of Payment

Data Elements	MDDS Codes	Data Format	Maximum Size	Code Directory	Primary Care				Specialist Care		
					SCs	HWCs	PHCs	GP Clinics	CHCs	DHs	Hospitals
Third Party Administrator (TPA) Code	05.006.0001	Integer	3	CD05.118	1	1	1	1	1	1	1
Third Party Administrator (TPA) Name	05.006.0002	Varchar	99	CD05.118	1	1	1	1	1	1	1
Health Plan Type	05.006.0005	Integer	1	CD05.014	1	1	1	1	1	1	1
Insured Card ID	05.006.0003	Varchar	50		1	1	1	1	1	1	1
Insurance Policy ID	05.006.0006	Varchar	50		1	1	1	1	1	1	1
Insurance Policy Name	05.006.0007	Varchar	99								
Source of Payment	05.006.0008	Integer	2	CD05.141	1	1	1	1	1	1	1
Secondary Health Insurance Policy Indicator	05.006.0009	Integer	1		1	1	1	1	1	1	1
Secondary Health Insurance Policy ID	05.006.0010	Varchar	50		1	1	1	1	1	1	1
Family Physician Indicator	05.006.0011	Integer	1		1	1	1	1	1	1	1

Patient Employee ID	05.006.0034	Varchar	50		1	1	1	1	1	1	1
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3.1.6 Entity: Facility

Data Elements	MDDS Codes	Data Format	Maximum Size	Code Directory	Primary Care				Specialist Care		
					SCs	HWCs	PHCs	GP Clinics	CHCs	DHs	Hospitals
Unique Facility Identification Number	05.008.0001	Integer	10	CD05.001	1	1	1	1	1	1	1
Facility Type Code	05.008.0002	Integer	2	CD05.002	1	1	1	1	1	1	1
Facility Ownership Authority	05.008.0005	Integer	10	CD05.003	1	1	1	1	1	1	1
Facility Ownership Authority Type	05.008.0006	Integer	2	CD05.103	1	1	1	1	1	1	1
Facility Service Code	05.008.0009	Varchar	18	CD05.043	1	1	1	1	1	1	1
Facility Specialty Code	05.008.0010	Integer	3	CD05.011	1	1	1	1	1	1	1
Department Name	05.008.0015	Varchar	99	CD05.090	0	0	0	0	1	1	1
Ward Name	05.008.0016	Varchar	99	CD05.088	0	0	1	0	1	1	1
Bed Type	05.008.0017	Integer	1	CD05.091	1	0	1	0	1	1	1
Referral Facility Identification Number	05.008.0019	Integer	10	CD05.001	1	1	1	1	1	1	1
Referral Facility Type Code	05.008.0020	Integer	2	CD05.002	1	1	1	1	1	1	1
Referral from Facility Identification Number	05.008.0021	Integer	10	CD05.001	1	1	1	1	1	1	1
Referral from Facility Type Code	05.008.0022	Integer	2	CD05.002	1	1	1	1	1	1	1
Facility Global Unique Identifier (GUID)	05.008.0025	Bits	16		1	1	1	1	1	1	1

