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Introduction

This guide is written for third party developers or patients who are developing software applications for accessing Protected Health Information (PHI) of patients on the Kareo Platform. This documentation outlines the authentication details and methods to connect to the API to retrieve patient health information.
SECTION ONE

API Terms of Use

1) Acceptance of Terms

You must accept this Kareo Terms of Use (“Agreement”) in order to use the Kareo public Application Programming Interface (“API”). This Agreement describes your rights and your obligations if you use the Kareo API. It is important that you read the Agreement carefully because you will be legally bound to these terms and your use of the Kareo API is subject to this Agreement. By accepting this Agreement or by accessing or using the Kareo API, you agree to be bound by this Agreement.

If you are entering into this Agreement on behalf of a company or other legal entity (“Entity”), you represent that you have the authority to bind such Entity to this Agreement. In that case, the terms “you” or “your” shall also refer to such Entity. If you do not have such authority, or if the Entity does not agree to be bound by this Agreement, the Entity and you may not use the Kareo API. You acknowledge that this Agreement is a contract between you and Kareo, even though it is electronic and is not physically signed by you and Kareo.

2) API Definitions

a) Application: Any software application, website, or product you create, or service you offer, using the Kareo API; b) API Documentation: The documentation, data and information that Kareo provides regarding use of the Kareo API through the Developer Site; c) Developer Site: Kareo’s MACRA information and tools for developers is found at www.kareo.com/macra; d) Kareo API: The publicly available Kareo Application Programming Interface (“API”) as well as the related API Documentation; e) Kareo Brand: The Kareo brand and brand assets, including names, logos, trade names and trademarks.
3) **API License**

Kareo hereby grants you a revocable, limited, personal, non-sublicensable, non-exclusive, and non-transferable license to use the API to develop, test, and support your Application, and to integrate the Kareo API with your Application. Your license is subject to the limitations set forth in Section 4 and Section 9 below.

4) **Use of APIs and Kareo Data**

4.1 You may not use the Kareo API in a manner that accesses or uses any information beyond what Kareo allows under this Agreement or the API Documentation; that changes, breaks or circumvents any of Kareo’s technical, administrative, process or security measures; that disrupts or degrades the performance of the Kareo API; or that tests the vulnerability of Kareo’s systems or networks.

4.2 You may not transmit any viruses or other computer programming that may damage, detrimentally interfere with, surreptitiously intercept, or expropriate any system or data.

4.3 You may not attempt to reverse engineer or otherwise derive source code, trade secrets, or know-how in the Kareo API or any portion thereof;

4.4 You may not use the Kareo API to replicate or compete with core products or services offered by Kareo. You acknowledge and agree that Kareo has or may in the future offer products or services that are similar to your Application, and nothing will prevent Kareo from doing so;

4.5 You may charge for your Application. However, you may not sell, rent, lease, sublicense, redistribute, or syndicate access to the Kareo API.

4.6 You may place advertisements on and around your Application. However, you may not: a) place any advertisements that resemble or are reasonably likely to confuse users as being a message from Kareo; or b) use any content from Kareo in any advertisements or for purposes of targeting advertisements, in your Application or elsewhere.
4.7 You will not attempt to exceed or circumvent limitations on access, calls and use of the Kareo API, or otherwise use the Kareo API in a manner that exceeds reasonable request volume, constitutes excessive or abusive usage, or otherwise fails to comply or is inconsistent with any part of this Agreement or the Documentation.

4.8 You may not use the Kareo API in any Application that includes adult content, promotes gambling, involves the sale of tobacco or alcohol to persons under 21 years of age, or otherwise violates any applicable law or regulation.

4.9 You may not distribute or allow access to the Kareo API to anyone other than, if applicable, the Entity on whose behalf you entered into this Agreement.

5) Security Measures

5.1 The network, operating system and software of your web servers, databases, and computer systems (collectively, “Your Systems”) must be properly configured to securely operate your Application. Your Application must use reasonable security measures to protect your users’ information. You must not architect or select Your Systems in a manner to avoid the foregoing obligation.

5.2 You must promptly report any security deficiencies in, or intrusions to, your Systems to Kareo in writing via email to security@kareo.com or subsequent contact information posted on the Developer Site. You will work with Kareo to immediately correct any security deficiency, and will immediately disconnect any intrusions or intruder. In the event of any security deficiency or intrusion involving the Application, or the Kareo API, you will make no public statements regarding such deficiencies or intrusions (e.g., press, blogs, social media, bulletin boards, etc.) without prior written and express permission from Kareo in each instance.

6) Ownership

As between you and Kareo, Kareo owns all right, title, and interest, including all intellectual property rights, in and to, the Kareo API, Documentation, and all elements and components thereof (collectively, the “Kareo Materials”). Except for the express license granted in this Agreement, Kareo does not grant you any right, title, or interest in or to the Kareo Materials. If you provide any feedback (“Feedback” is defined as any
recommendations, enhancements, requests, suggestions or other similar activity) to Kareo regarding the Kareo API or Documentation, you hereby agree that Kareo will own any such Feedback and you hereby grant Kareo a perpetual, irrevocable, world-wide, and royalty-free license to use the Feedback for the purpose of improving and creating derivative works of Kareo's API and Documentation.

7) Term and Termination

7.1 This Agreement will go into effect on the date upon which you agree to them, by accessing or using the Kareo API, and will continue until terminated as set forth herein.

7.2 You may terminate this Agreement by discontinuing use of the Kareo API.

7.3 Upon termination of this Agreement:

    7.3.1 All rights and licenses granted to you will terminate immediately.

    7.3.2 You will promptly destroy Documentation and any other Kareo information in your possession or control that was received under this Agreement.

8) Modifications to this Agreement

Kareo may change, add to or delete any portion of this Agreement in its sole discretion. If Kareo does so, it will provide you with reasonable notice prior to the changes either by emailing the email address associated with your account or by posting a notice on the Developer Site. Your continued access or use of the Kareo API will mean that you agree to the changes.

9) Disclaimer of Warranties; Limitation of Liability; Indemnity

9.1 No Warranties. The Kareo API and all related components are provided on an “as is” and “as available” basis without any warranties of any kind, and Kareo expressly disclaims any and all warranties, whether express or implied, including, but not limited to, the implied warranties of merchantability, title, fitness for a particular purpose, and non-infringement. You acknowledge that Kareo does not warrant that the Kareo API will be uninterrupted, timely, secure, error-free or virus-free,
NOR DOES IT MAKE ANY WARRANTY AS TO THE RESULTS THAT MAY BE OBTAINED FROM
USE OF THE KAREO API, AND NO INFORMATION, ADVICE OR SERVICES OBTAINED BY
YOU FROM KAREO OR THROUGH THE DEVELOPER SITE SHALL CREATE ANY WARRANTY
NOT EXPRESSLY STATED IN THIS AGREEMENT.

9.2 LIMITATION ON LIABILITY. UNDER NO CIRCUMSTANCES AND UNDER NO LEGAL THEO-
RY (WHETHER IN CONTRACT, TORT, OR OTHERWISE) SHALL KAREO BE LIABLE TO YOU
OR ANY THIRD PARTY FOR (A) ANY INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY,
CONSEQUENTIAL OR PUNITIVE DAMAGES, INCLUDING LOST PROFITS, LOST SALES OR
BUSINESS, OR LOST DATA, OR (B) ANY MATTER BEYOND KAREO'S REASONABLE
CONTROL. THE PROVISIONS OF THIS SECTION ALLOCATE THE RISKS UNDER THIS
AGREEMENT BETWEEN THE PARTIES, AND THE PARTIES HAVE RELIED ON THESE
LIMITATIONS IN DETERMINING WHETHER TO ENTER INTO THIS AGREEMENT. SOME
JURISDICTIONS DO NOT ALLOW THE EXCLUSION OF IMPLIED WARRANTIES OR
LIMITATION OF LIABILITY FOR INCIDENTAL OR CONSEQUENTIAL DAMAGES, WHICH
MEANS THAT SOME OF THE ABOVE LIMITATIONS MAY NOT APPLY TO YOU. IN THESE
JURISDICTIONS, KAREO'S LIABILITY WILL BE LIMITED TO THE GREATEST EXTENT
PERMITTED BY LAW.

9.3 Indemnity. You agree to defend, hold harmless and indemnify Kareo, and its
subsidiaries, affiliates, officers, agents, employees, and suppliers, from and against
any third party claim arising from or in any way related to your or your users’ use of the
Application or the Kareo API, or any violation of this Agreement, including any liability
or expense arising from all claims, losses, damages (actual and consequential), suits,
judgments, litigation costs and attorneys’ fees, of every kind and nature. In such a
case, we will provide you with written notice of such claim, suit, or action.

10) Dispute Resolution

Any claim, cause of action or dispute ("Claim") arising out of or related to this Agreement
shall be governed by the laws of the state of California, United States, regardless of your
country of origin or where you access the Kareo API, and notwithstanding any conflicts of
and Kareo agree that all Claims arising out of or related to this Agreement must be resolved
exclusively in the courts located in the county of Orange, California or the U.S. District Court
for the Central District of California. You and Kareo agree to submit to the personal
jurisdiction of the courts located within the county of Orange, California or the Central District of California, and agree to waive any and all objections to the exercise of jurisdiction over the parties by such courts and to venue in such courts for the purpose of litigating all such Claims. Notwithstanding the above, you agree that Kareo shall still be allowed to apply for injunctive remedies in any jurisdiction.

11) **General Legal Terms**

11.1 If any provision of this Agreement is found to be illegal, void, or unenforceable, the unenforceable provision will be modified so as to render it enforceable to the maximum extent possible in order to effect the intention of the provision; if a term cannot be so modified, it will be severed and the remaining provisions of this Agreement will not be affected in any way.

11.2 You will comply with all applicable law, regulations and third-party rights (including, without limitation, HIPAA regulations and privacy laws).

11.3 Notice and Service of Process. We may notify you via postings on the Developer Site or via the email address associated with your Application. Kareo accepts service of process by mail or courier at the physical address set forth in Section 11.6 below. Any notices that you provide without compliance with this section shall have no legal effect.

11.4 This Agreement and the API Documentation, constitute the entire agreement between you and Kareo regarding the Kareo API and supersedes all prior agreements and understandings, whether written or oral, or whether established by custom, practice, policy or precedent, with respect to the subject matter of this Agreement.

11.5 Our failure to act with respect to a breach of this Agreement by you or others does not waive our right to act with respect to that breach or subsequent similar or other breaches.
SECTION TWO

General Concepts

Connecting to the Server

The APIs may only be accessed by clients through an https (SSL/TLS 1.1) connection. Limit your connection frequency as appropriate for your use case. Connection attempts which are more frequent than permitted are not allowed.

Authentication

Generating an API Key

An API Key can be generated by logging into the Kareo Patient Portal. New API Keys can be generated by accessing the Patient Portal and navigating to “My Account” > “API Access Key”

Extra precautions need to be exercised to prevent unauthorized access to the API Key.

API Key Usage

All requests to the API must include the API Key transmitted in the HTTP header parameter “X-Api-Key”. If the API Key is missing, revoked or otherwise not valid, the API will return a 401 (Unauthorized).

<table>
<thead>
<tr>
<th>Header</th>
<th>Description</th>
<th>Required</th>
<th>Example</th>
</tr>
</thead>
<tbody>
<tr>
<td>X-Api-Key</td>
<td>API Key value</td>
<td>Y</td>
<td>X-Api-Key: d931d5e5-47ca-4699-a3ef-7d945d1cfcb0</td>
</tr>
</tbody>
</table>
**API Key Revocation**

At any point, the patient may revoke and thus invalidating their current generated API Key. If an existing API Key is revoked, all API requests using the revoked key will return a 403 (Forbidden) response.

**Response**

**Content Type**

All API response content types are “application/json”.

**General Response Codes**

<table>
<thead>
<tr>
<th>Code</th>
<th>Message</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>400</td>
<td>&lt;Specific validation error&gt;</td>
<td>Any type of validation (e.g., parameters) errors.  <strong>Example:</strong> “Start date can not be after end date”, etc.</td>
</tr>
<tr>
<td>401</td>
<td>API key is required</td>
<td>No API key was supplied</td>
</tr>
<tr>
<td>200</td>
<td>&lt;Response content&gt;</td>
<td>Request was processed successfully</td>
</tr>
<tr>
<td>500</td>
<td>An error occurred while processing your request</td>
<td>An unexpected exception occurred while processing request</td>
</tr>
</tbody>
</table>

**Data Value Concepts**

<table>
<thead>
<tr>
<th>Value</th>
<th>Description</th>
<th>Example</th>
</tr>
</thead>
<tbody>
<tr>
<td>null</td>
<td>A “null” value is returned for fields where a value is undefined</td>
<td>“endDate”: null</td>
</tr>
</tbody>
</table>
SECTION THREE

Resources

Patient

Patient | Retrieves a patient
---|---
Request | [https://api.kareo.com/clinical/v1/api/patient](https://api.kareo.com/clinical/v1/api/patient)
Method | GET
Parameters | None

Response Fields

<table>
<thead>
<tr>
<th>Parent Field</th>
<th>Field</th>
<th>Description</th>
</tr>
</thead>
</table>
| N/A | meta | **Type**: String  
Encapsulates the meta data of the result |
| meta | date | **Type**: String  
Date and time the response was generated  
UTC ISO 8601 datetime with time zone in extended notation (e.g., 2007-04-05T14:30Z) |
| N/A | patient | **Type**: Element  
Encapsulates patient records |
| patient | patientId | **Type**: String  
Canonical textual representation of the patient's UUID |
| patient | dob | **Type**: Date  
Patient's date of birth  
ISO 8601 date (e.g., 2007-04-05) |

continued on next page...
<table>
<thead>
<tr>
<th>Parent Field</th>
<th>Field</th>
<th>Description</th>
</tr>
</thead>
</table>
| patient      | gender    | Type: String Possible Values:  
- “male”  
- “female”  
- “Undifferentiated”  
Patient’s gender |
| patient      | ethnicity | Type: Array  
Patient’s ethnicities  
“Race & Ethnicity” - CDC code system OID: 2.16.840.1.113883.6.238 |
| ethnicity     | code      | Type: String  
Ethnicity concept code |
| ethnicity     | name      | Type: String  
Ethnicity concept name |
| patient      | ethnicityGroup | Type: Array |
| ethnicityGroup | code     | Type: String |
| ethnicityGroup | name     | Type: String |
| patient      | race      | Type: Array  
Patient’s races  
“Race & Ethnicity” - CDC code system OID: 2.16.840.1.113883.6.238 |
| race          | code      | Type: String  
Race concept code |
| race          | name      | Type: String  
Race concept name |
| patient      | raceGroup | Type: Array  
Patient’s race(s) roll-up categories  
“Race & Ethnicity” - CDC code system OID: 2.16.840.1.113883.6.238 |

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<table>
<thead>
<tr>
<th>Parent Field</th>
<th>Field</th>
<th>Description</th>
</tr>
</thead>
</table>
| raceGroup    | code  | Type: String  
Patient’s race(s) category concept code |
| raceGroup    | name  | Type: String  
Patient’s race(s) category concept name |
| patient      | communication | Type: Array  
Patient’s communication |
| communication| language | Type: Element  
Patient’s communication language |
| language     | code  | Type: String  
ISO 639-2 language code |
| language     | name  | Type: String  
ISO 639-2 language name |
| communication| preferred | Type: Boolean  
“True” if the indicated language is their preferred language, else “false”. |
| patient      | firstName | Type: String  
Patient’s given name |
| patient      | lastName | Type: String  
Patient’s family name |
Encounter

Retrieve a list of relevant information regarding the visit, care team, health concerns associated with the patient

Request

https://api.kareo.com/clinical/v1/api/patient/encounter

Method

GET

Parameters

<table>
<thead>
<tr>
<th>Parameters</th>
<th>Description</th>
<th>Required</th>
<th>Example</th>
</tr>
</thead>
<tbody>
<tr>
<td>startdate</td>
<td>Start date (inclusive) to filter encounters based on date of services</td>
<td>N</td>
<td>04-13-1977</td>
</tr>
<tr>
<td></td>
<td>If no start date is specified:</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>• and no end date is specified,</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>then all encounter records are returned</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>and an end date is specified,</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>then all encounter records prior to and including the end date are returned</td>
<td></td>
<td></td>
</tr>
<tr>
<td>endDate</td>
<td>End date (inclusive) to filter encounters based on date of services</td>
<td>N</td>
<td>04-13-2004</td>
</tr>
<tr>
<td></td>
<td>If no end date is specified:</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>• and no start date is specified,</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>then all encounter records are returned</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>• and a start date is specified,</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>then all encounter records after and including the start date are returned</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Response Fields

<table>
<thead>
<tr>
<th>Parent Field</th>
<th>Field</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>N/A</td>
<td>meta</td>
<td>Type: Element</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Encapsulates the meta data of the result</td>
</tr>
<tr>
<td>meta</td>
<td>date</td>
<td>Type: Date</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Date and time the response was generated</td>
</tr>
<tr>
<td></td>
<td></td>
<td>UTC ISO 8601 datetime with time zone in extended notation (e.g., 2007-04-05T14:30Z)</td>
</tr>
</tbody>
</table>

continued on next page...
<table>
<thead>
<tr>
<th>Parent Field</th>
<th>Field</th>
<th>Description</th>
</tr>
</thead>
</table>
| patient      | patientId | Type: String
                                 Canonical textual representation of the patient’s UUID |
| N/A          | encounter | Type: Array
                                 Encapsulates the patient assessments |
| encounter    | participant | Type: Array
                                  List of participants in the care team |
| participant  | name      | Type: String
                                 Full name of the care team participant |
| encounter    | period    | Type: Element |
| period       | endDate   | Type: Date
                                 Date of the encounter
                                 ISO 8601 date (e.g., 2007-04-05) |
| encounter    | location  | Type: Element |
| location     | identifier | Type: String
                                   Canonical textual representation of the service location UUID |
| location     | name      | Type: String
                                  Name of the location |
| location     | address   | Type: Element
                                   Address of the location |
| address      | street    | Type: String
                                  Street of the location |
| address      | city      | Type: String
                                  City of the location |
| address      | state     | Type: String
                                   2-letter state code used by the United States Postal Service |

continued on next page...
<table>
<thead>
<tr>
<th>Parent Field</th>
<th>Field</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>address</td>
<td>postalCode</td>
<td>Type: String 5 or 9 digit postal code</td>
</tr>
<tr>
<td>encounter</td>
<td>diagnosis</td>
<td>Type: Element</td>
</tr>
<tr>
<td>diagnosis</td>
<td>condition</td>
<td>Type: Element Encapsulate health concerns and other conditions</td>
</tr>
<tr>
<td>condition</td>
<td>text</td>
<td>Type: String Textual description of the condition</td>
</tr>
</tbody>
</table>
Example

```
{
  "meta":{
    "date":"2007-04-05T14:30Z"
  },
  "patient":{
    "patientId": "1fc15e44-c6b3-44b7-94ad-d992fbe1c550"
  },
  "encounter":{
    "identifier":"43d1ac14-891b-6a4f-e053-c9371e0abd74",
    "participant":{
      "name":"Dr. John Doe"
    },
    {"name":"Jane Doe"
    },
    "period":{
      "endDate":"2016-12-16"
    },
    "location":{
      "identifier":"c961e60d-178d-4f18-939b-e2e6e60ac94d",
      "name":"Johnson Clinic",
      "address":{
        "street":"100 S. Johnsonville Ave",
        "city":"Alhambra",
        "state":"CA",
        "postalCode":"91801-3166"
      }
    },
    "diagnosis":{
      "condition":{
        "text":"Chronic Sickness exhibited by patient"
      }
    }
  }
}
```
## Allergy Intolerance / Medication Allergy

**Medical Allergy**  
Retrieves a list of medication allergies associated with the patient

**Request**  
https://api.kareo.com/clinical/v1/api/patient/allergyIntolerance/medicalAllergy

**Method**  
GET

<table>
<thead>
<tr>
<th>Parameters</th>
<th>Description</th>
<th>Required</th>
<th>Example</th>
</tr>
</thead>
<tbody>
<tr>
<td>startdate</td>
<td>Start date (inclusive) to filter allergy records</td>
<td>N</td>
<td>04-13-1977</td>
</tr>
<tr>
<td></td>
<td>If no start date is specified:</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>• and no end date is specified, then all allergy records are returned</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>• and an end date is specified, then all allergy records prior to and including the end date are returned</td>
<td></td>
<td></td>
</tr>
<tr>
<td>endDate</td>
<td>End date (inclusive) to filter allergy records</td>
<td>N</td>
<td>04-13-2004</td>
</tr>
<tr>
<td></td>
<td>If no end date is specified:</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>• and no start date is specified, then all allergy records are returned</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>• and a start date is specified, then all allergy records after and including the start date are returned</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
## Response Fields

<table>
<thead>
<tr>
<th>Parent Field</th>
<th>Field</th>
<th>Description</th>
</tr>
</thead>
</table>
| N/A          | meta          | Type: Element
Encapsulates the meta data of the result |
| meta         | date          | Type: Date
Date and time the response was generated
UTC ISO 8601 datetime with time zone in extended notation
(e.g., 2007-04-05T14:30Z) |
| N/A          | patient       | Type: Element
Encapsulates patient records |
| patient      | patientId     | Type: String
Canonical textual representation of the patient’s UUID |
| N/A          | allergyIntolerance | Type: Element
Encapsulates the patient allergy intolerances |
| allergyIntolerance | medicalAllergy | Type: Array
Encapsulates the patient medical allergies |
| medicalAllergy | code         | Type: String
RxNorm code |
| medicalAllergy | allergen      | Type: String
Name of allergen |
| medicalAllergy | reaction      | Type: Array
Allergic reaction |
| reaction     | code          | Type: String
SNOMED CT code for reaction |
| reaction     | name          | Type: String
Name of reaction |

continued on next page...
<table>
<thead>
<tr>
<th>Parent Field</th>
<th>Field</th>
<th>Description</th>
</tr>
</thead>
</table>
| medicalAllergy | severity | **Type:** String  
**Possible Values:**  
• “Fatal”  
• “Severe”  
• “Moderate to severe”  
• “Moderate”  
• “Mild to moderate”  
• “Mild”  
• “Unknown”  
Severity of reaction |
| medicalAllergy | startDate | **Type:** Date  
Date of onset  
ISO 8601 date (e.g., 2007-04-05) |
| medicalAllergy | status | **Type:** String  
Possible Values:  
• “Active”  
• “Not Active”  
Status of allergy |
Example

```json
{
  "meta":{
    "date":"2007-04-05T14:30Z"
  },
  "patient":{
    "patientId": "1fc15e44-c6b3-44b7-94ad-d992fbe1c550"
  },
  "allergyIntolerance":{
    "medicalAllergy":{
      "code":"253157",
      "name":"bee pollen",
      "reaction":{
        "code":"49727002",
        "name":"cough"
      },
      "severity":"Mild",
      "startDate":"2017-08-02",
      "status":"Active"
    },
    {
      "code":"
      "name":"penicillin",
      "reaction":{
        "code":"190855004",
        "name":"hypomagnesemia"
      },
      {
        "code":"369546013",
        "name":"hives"
      },
      "severity":"Severe",
      "startDate":"1997-01-02",
      "status":"Not Active"
    }
  }
}
```
**Care Plan**

<table>
<thead>
<tr>
<th>Care Plan</th>
<th>Retrieve a list of care plan(s) and assessment(s) associated with the patient</th>
</tr>
</thead>
<tbody>
<tr>
<td>Method</td>
<td>GET</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Parameters</th>
<th>Description</th>
<th>Required</th>
<th>Example</th>
</tr>
</thead>
</table>
| startdate  | Start date (inclusive) to filter care plans based on encounter date of services  
If no start date is specified:  
• and no end date is specified, then all care plan records are returned  
• and an end date is specified, then all care plan records with encounter dates of service prior to and including the end date are returned | N        | 04-13-1977      |
| endDate    | End date (inclusive) to filter care plans based on encounter date of services  
If no end date is specified:  
• and no start date is specified, then all care plan records are returned  
• and a start date is specified, then all care plan records with encounter dates of service after and including the start date are returned | N        | 04-13-2004      |
## Response Fields

<table>
<thead>
<tr>
<th>Parent Field</th>
<th>Field</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>N/A</td>
<td>meta</td>
<td><strong>Type:</strong> Element&lt;br&gt;Encapsulates the meta data of the result</td>
</tr>
<tr>
<td>meta</td>
<td>date</td>
<td><strong>Type:</strong> Date&lt;br&gt;Date and time the response was generated&lt;br&gt;UTC ISO 8601 datetime with time zone in extended notation (e.g., 2007-04-05T14:30Z)</td>
</tr>
<tr>
<td>N/A</td>
<td>patient</td>
<td><strong>Type:</strong> Element&lt;br&gt;Encapsulates patient records</td>
</tr>
<tr>
<td>patient</td>
<td>patientId</td>
<td><strong>Type:</strong> String&lt;br&gt;Canonical textual representation of the patient's UUID</td>
</tr>
<tr>
<td>N/A</td>
<td>carePlan</td>
<td><strong>Type:</strong> Array</td>
</tr>
<tr>
<td>carePlan</td>
<td>context</td>
<td><strong>Type:</strong> Element</td>
</tr>
<tr>
<td>context</td>
<td>encounter</td>
<td><strong>Type:</strong> Element</td>
</tr>
<tr>
<td>encounter</td>
<td>period</td>
<td><strong>Type:</strong> Element</td>
</tr>
<tr>
<td>period</td>
<td>endDate</td>
<td><strong>Type:</strong> Date&lt;br&gt;Date of encounter&lt;br&gt;ISO 8601 date (e.g., 2007-04-05)</td>
</tr>
<tr>
<td>carePlan</td>
<td>addresses</td>
<td><strong>Type:</strong> Element&lt;br&gt;Assessment that care plan addresses</td>
</tr>
<tr>
<td>addresses</td>
<td>text</td>
<td><strong>Type:</strong> String</td>
</tr>
<tr>
<td>carePlan</td>
<td>activity</td>
<td><strong>Type:</strong> Element&lt;br&gt;Care plan activities</td>
</tr>
<tr>
<td>activity</td>
<td>detail</td>
<td><strong>Type:</strong> Element</td>
</tr>
<tr>
<td>detail</td>
<td>description</td>
<td><strong>Type:</strong> String</td>
</tr>
</tbody>
</table>
Example

```json
{
    "meta": {
        "date": "2007-04-05T14:30Z"
    },
    "patient": {
        "patientId": "1fc15e44-c6b3-44b7-94ad-d992fbe1c550"
    },
    "carePlan": [
        {
            "context": {
                "encounter": {
                    "period": {
                        "endDate": "2016-12-16"
                    }
                }
            },
            "addresses": {
                "text": "The patient was found to have fever and is suspecting Anemia based on the patient history. Asked the patient to closely monitor the temperature and blood pressure if the fever does not subside within a day."
            },
            "activity": {
                "detail": {
                    "description": "Get an EKG done on 6/23/2015. ii. Get a Chest X-ray done on 6/23/2015 showing the Lower Respiratory Tract Structure. iii. Take Clindamycin 300mg three times a day as needed if pain does not subside."
                }
            }
        }
    ]
}
```
## Condition / Problem List

### Problem List
Retrieve a list of problems associated with the patient

### Request

### Method
GET

<table>
<thead>
<tr>
<th>Parameters</th>
<th>Description</th>
<th>Required</th>
<th>Example</th>
</tr>
</thead>
</table>
| startdate  | Start date (inclusive) to filter problem records  
When filtering by date, records with undefined start dates are always included  
If no start date is specified:  
• and no end date is specified, then all problem records are returned  
• and an end date is specified, then all problem records prior to and including the end date are returned | N | 04-13-1977 |

| endDate    | End date (inclusive) to filter problem records  
If no end date is specified:  
• and no start date is specified, then all problem records are returned  
• and a start date is specified, then all problem records with encounter dates of service after and including the start date are returned | N | 04-13-2004 |
**Response Fields**

<table>
<thead>
<tr>
<th>Parent Field</th>
<th>Field</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>N/A</td>
<td>meta</td>
<td><strong>Type:</strong> Element&lt;br&gt;Encapsulates the meta data of the result</td>
</tr>
<tr>
<td>meta</td>
<td>date</td>
<td><strong>Type:</strong> Date&lt;br&gt;Date and time the response was generated</td>
</tr>
<tr>
<td>N/A</td>
<td>patient</td>
<td><strong>Type:</strong> Element&lt;br&gt;Encapsulates patient records</td>
</tr>
<tr>
<td>patient</td>
<td>patientId</td>
<td><strong>Type:</strong> String&lt;br&gt;Canonical textual representation of the patient's UUID</td>
</tr>
<tr>
<td>N/A</td>
<td>condition</td>
<td><strong>Type:</strong> Element&lt;br&gt;Encapsulates the patient conditions</td>
</tr>
<tr>
<td>condition</td>
<td>problemList</td>
<td><strong>Type:</strong> Array&lt;br&gt;List of patient problems</td>
</tr>
<tr>
<td>problemList</td>
<td>code</td>
<td><strong>Type:</strong> String&lt;br&gt;Identification of the problem&lt;br&gt;SNOMED CT® OID: 2.16.840.1.113883.6.96</td>
</tr>
<tr>
<td>problemList</td>
<td>name</td>
<td><strong>Type:</strong> String&lt;br&gt;Textual representation of the problem</td>
</tr>
<tr>
<td>problemList</td>
<td>startDate</td>
<td><strong>Type:</strong> Date&lt;br&gt;Date of onset</td>
</tr>
<tr>
<td>problemList</td>
<td>endDate</td>
<td><strong>Type:</strong> Date&lt;br&gt;Date of resolution</td>
</tr>
<tr>
<td>problemList</td>
<td>status</td>
<td><strong>Type:</strong> String&lt;br&gt;Possible Values:&lt;br&gt;• “ACTIVE”&lt;br&gt;• “INACTIVE”&lt;br&gt;• “RESOLVED”</td>
</tr>
</tbody>
</table>
Example

```json
{
    "meta":{
        "date":"2007-04-05T14:30Z"
    },
    "patient":{
        "patientId": "1fc15e44-c6b3-44b7-94ad-d992fbe1c550"
    },
    "condition":{
        "problemList":[
            {
                "code": "59621000",
                "name": "Essential hypertension (Disorder)",
                "startDate": "10/5/2011",
                "status": "ACTIVE"
            },
            {
                "code": "83986005",
                "name": "Severe Hypothyroidism (Disorder)",
                "startDate": "10/5/2006",
                "endDate": "6/1/2007",
                "status": "RESOLVED"
            }
        ]
    }
}
```
# Device

Retrieve a list of unique device identifier(s) for a patient's implantable device(s) associated with the patient

**Request**  
https://api.kareo.com/clinical/v1/api/patient/device

**Method**  
GET

<table>
<thead>
<tr>
<th>Parameters</th>
<th>Description</th>
<th>Required</th>
<th>Example</th>
</tr>
</thead>
</table>
| startdate  | Start date (inclusive) to filter device records  
If no start date is specified:  
• and no end date is specified, then all device records are returned  
• and an end date is specified, then all device records prior to and including the end date are returned | N | 04-13-1977 |
| endDate    | End date (inclusive) to filter device records  
If no end date is specified:  
• and no start date is specified, then all device records are returned  
• and a start date is specified, then all device records after and including the start date are returned | N | 04-13-2004 |
## Response Fields

<table>
<thead>
<tr>
<th>Parent Field</th>
<th>Field</th>
<th>Description</th>
</tr>
</thead>
</table>
| N/A | meta | Type: Element  
Encapsulates the meta data of the result |
| meta | date | Type: Date  
Date and time the response was generated  
UTC ISO 8601 datetime with time zone in extended notation  
(e.g., 2007-04-05T14:30Z) |
| N/A | patient | Type: Element  
Encapsulates patient records |
| patient | patientId | Type: String  
Canonical textual representation of the patient’s UUID |
| N/A | device | Type: Element  
Encapsulates the patient devices |
| device | udi | Type: Array |
| udi | devicelIdentifier | Type: String  
FDA device identifier |
| udi | carrierHRF | Type: String  
FDA barcode in Human Readable Format |
| udi | name | Type: String  
Global Medical Device Nomenclature (GMDN) |
| udi | note | Type: String  
Comments associated with device entry |
Example

```json
{
  "meta": {
    "date": "2007-04-05T14:30Z"
  },
  "patient": {
    "patientId": "1fc15e44-c6b3-44b7-94ad-d992f8e1c550"
  },
  "device": {
    "udi": [
      {
        "deviceIdentifier": "00643169007222",
        "carrierHRF": "(01)00643169007222(17)160128(21)BLC200461H",
        "name": "Cardiac resynchronization therapy implantable defibrillator"
      },
      {
        "deviceIdentifier": "00836559004745",
        "carrierHRF": "(01)00836559004745(17)160128(21)ABC200461H",
        "name": "Pacing/defibrillation lead electrical adaptor"
      }
    ]
  }
}
```
**Procedure**

<table>
<thead>
<tr>
<th><strong>Procedure</strong></th>
<th>Retrieve a list of procedures associated with the patient</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Request</strong></td>
<td><a href="https://api.kareo.com/clinical/v1/api/patient/procedure">https://api.kareo.com/clinical/v1/api/patient/procedure</a></td>
</tr>
<tr>
<td><strong>Method</strong></td>
<td>GET</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th><strong>Parameters</strong></th>
<th><strong>Description</strong></th>
<th><strong>Required</strong></th>
<th><strong>Example</strong></th>
</tr>
</thead>
<tbody>
<tr>
<td>startdate</td>
<td>Start date (inclusive) to filter procedures If no start date is specified: • and no end date is specified, then all procedure records are returned • and an end date is specified, then all procedure records prior to and including the end date are returned</td>
<td>N</td>
<td>04-13-1977</td>
</tr>
<tr>
<td>endDate</td>
<td>End date (inclusive) to filter encounters based on date of services If no end date is specified: • and no start date is specified, then all procedure records are returned • and a start date is specified, then all procedure records after and including the start date are returned</td>
<td>N</td>
<td>04-13-2004</td>
</tr>
</tbody>
</table>
## Response Fields

<table>
<thead>
<tr>
<th>Parent Field</th>
<th>Field</th>
<th>Description</th>
</tr>
</thead>
</table>
| N/A          | meta     | Type: Element  
Encapsulates the meta data of the result |
| meta         | date     | Type: Date  
Date and time the response was generated  
UTC ISO 8601 datetime with time zone in extended notation (e.g., 2007-04-05T14:30Z) |
| N/A          | patient  | Type: Element  
Encapsulates patient records |
| patient      | patientId| Type: String  
Canonical textual representation of the patient’s UUID |
| N/A          | procedure| Type: Array  
Encapsulates the patient procedures |
| procedure    | code     | Type: String  
CPT code |
| procedure    | name     | Type: String  
CPT procedure name |
| procedure    | date     | Type: Date  
Date of procedure  
ISO 8601 date (e.g., 2007-04-05) |
| procedure    | status   | Type: String  
Possible Values:  
• “Completed”  
• “Active”  
• “Aborted”  
• “Cancelled”  
• “Scheduled”  
Status |
Example

```json
{
   "meta":{
      "date":"2007-04-05T14:30Z"
   },
   "patient":{
      "patientId":"1fc15e44-c6b3-44b7-94ad-d992fbe1c550"
   },
   "procedure":[
      {
         "code":"92100",
         "name":"Serial tonometry (sep proc) multiple measure, extended period, time, w/interpret & report, same day",
         "date":"2017-08-01",
         "status":"Completed"
      },
      {
         "code":"92314",
         "name":"Prescription/fitting contact lens w/medical supervision, independent tech; cornea, non-aphakia",
         "date":"2017-08-04",
         "status":"Scheduled"
      }
   ]
}
```
**Goal**

Retrieve a list of goals associated with the patient encounters

**Request**  
https://api.kareo.com/clinical/v1/api/patient/goal

**Method**  
GET

<table>
<thead>
<tr>
<th>Parameters</th>
<th>Description</th>
<th>Required</th>
<th>Example</th>
</tr>
</thead>
</table>
| startdate  | Start date (inclusive) to filter goals based on encounter date of service  
If no start date is specified:  
• and no end date is specified, then all goal records are returned  
• and an end date is specified, then all goals records with encounter dates of service prior to and including the end date are returned | N | 04-13-1977 |
| endDate    | End date (inclusive) to filter goals based on encounter date of service  
If no end date is specified:  
• and no start date is specified, then all section records are returned  
• and a start date is specified, then all goals records with encounter dates of service after and including the start date are returned | N | 04-13-2004 |
## Response Fields

<table>
<thead>
<tr>
<th>Parent Field</th>
<th>Field</th>
<th>Description</th>
</tr>
</thead>
</table>
| N/A          | meta  | Type: Element  
Encapsulates the meta data of the result |
| meta         | date  | Type: Date  
Date and time the response was generated  
UTC ISO 8601 datetime with time zone in extended notation (e.g., 2007-04-05T14:30Z) |
| N/A          | patient | Type: Element  
Encapsulates patient records |
| patient      | patientId | Type: String  
Canonical textual representation of the patient's UUID |
| N/A          | goal   | Type: Array  
Encapsulates the patient goals |
| goal         | statusDate | Type: Date  
Date of service for the corresponding encounter. ISO 8601 date (e.g., 2007-04-05) |
| goal         | description | Type: String  
Textual description of the goal |
Example

```json
{
  "meta":{
    "date":"2007-04-05T14:30Z",
  },
  "patient":{
    "patientId": "1fc15e44-c6b3-44b7-94ad-d992fbe1c550"
  },
  "goal":[{
    "statusDate":"2012-03-02"
    "description":"Stop smoking"
  },
  {"statusDate":"2012-03-14"
    "description":"Stop smoking"
  },
  {"statusDate":"2012-03-15"
    "description":"Target weight is 160 to 180 lbs."
  },
  {"statusDate":"2012-04-15"
    "description":"Patient wants to defer weight loss until after honeymoon."
  }
}
```
Observation / Vital Signs

<table>
<thead>
<tr>
<th>Parameters</th>
<th>Description</th>
<th>Required</th>
<th>Example</th>
</tr>
</thead>
</table>
| startdate  | Start date (inclusive) to filter vital sign records  
If no start date is specified:  
• and no end date is specified, then all vital sign records are returned  
• and an end date is specified, then all vital sign records prior to and including the end date are returned | N | 04-13-1977 |
| endDate    | End date (inclusive) to filter vital sign records  
If no end date is specified:  
• and no start date is specified, then all vital sign records are returned  
• and a start date is specified, then all vital sign records after and including the start date are returned | N | 04-13-2004 |
## Response Fields

<table>
<thead>
<tr>
<th>Parent Field</th>
<th>Field</th>
<th>Description</th>
</tr>
</thead>
</table>
| N/A          | meta     | **Type:** Element  
Encapsulates the meta data of the result |
| meta         | date     | **Type:** Date  
Date and time the response was generated  
UTC ISO 8601 datetime with time zone in extended notation  
(e.g., 2007-04-05T14:30Z) |
| N/A          | patient  | **Type:** Element  
Encapsulates patient records |
| patient      | patientId | **Type:** String  
Canonical textual representation of the patient’s UUID |
| N/A          | observation | **Type:** Array  
Encapsulates the patient observations |
| observation  | vitalSign | **Type:** Array  
Encapsulates the patient observation vitals |
| vitalSign    | code     | **Type:** String  
LOINC code |
| vitalSign    | name     | **Type:** String  
Textual name of the vital sign |
| vitalSign    | date     | **Type:** Date  
Date vital recorded  
ISO 8601 date (e.g., 2007-04-05) |
| vitalSign    | value    | **Type:** Double  
Value of the vital sign |
| vitalSign    | unit     | **Type:** String  
Unit of measurement. |
Example

{
  "meta":{
    "date":"2007-04-05T14:30Z"
  },
  "patient":{
    "patientId": "1fc15e44-c6b3-44b7-94ad-d992fbe1c550"
  },
  "observation":{
    "vitalSigns":[
      {
        "code":"3141-9",
        "name":"Weight",
        "date":"2013-03-02",
        "value":"100",
        "unit":"lbs"
      },
      {
        "code":"8462-4",
        "name":"BloodPressure (Diastolic)",
        "date":"2013-03-02",
        "value":"66",
        "unit":"mmHg"
      },
      {
        "code":"8480-6",
        "name":"BloodPressure (Systolic)",
        "date":"2013-03-02",
        "value":"122",
        "unit":"mmHg"
      }
    ]
  }
}
Observation / Smoking Status

**Device**
Retrieve the smoking status of a patient

**Request**
https://api.kareo.com/clinical/v1/api/patient/observation/socialHistory/smokingStatus

**Method**
GET

**Parameters**
None

**Response Fields**

<table>
<thead>
<tr>
<th>Parent Field</th>
<th>Field</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>N/A</td>
<td>meta</td>
<td>Type: Element Encapsulates the meta data of the result</td>
</tr>
<tr>
<td>meta</td>
<td>date</td>
<td>Type: Date Date and time the response was generated UTC ISO 8601 datetime with time zone in extended notation (e.g., 2007-04-05T14:30Z)</td>
</tr>
<tr>
<td>N/A</td>
<td>patient</td>
<td>Type: Element Encapsulates patient records</td>
</tr>
<tr>
<td>patient</td>
<td>patientId</td>
<td>Type: String Canonical textual representation of the patient’s UUID</td>
</tr>
<tr>
<td>N/A</td>
<td>observation</td>
<td>Type: Element Encapsulates the patient observations</td>
</tr>
<tr>
<td>observation</td>
<td>socialHistory</td>
<td>Type: Element Encapsulates the patient observation social histories</td>
</tr>
<tr>
<td>socialHistory</td>
<td>smokingStatus</td>
<td>Type: Array</td>
</tr>
<tr>
<td>smokingStatus</td>
<td>code</td>
<td>Type: String SNOMED code § 170.207(h) Smoking Status</td>
</tr>
</tbody>
</table>
Example

{
  "meta":{
    "date":"2007-04-05T14:30Z"
  },
  "patient":{
    "patientId":"1fc15e44-c6b3-44b7-94ad-d992fbe1c550"
  },
  "observation":{
    "socialHistory":{
      "smokingStatus":[
        {
          "code":"449868002"
        }
      ]
    }
  }
}
## Diagnostic Report

<table>
<thead>
<tr>
<th>Device</th>
<th>Retrieve a list of laboratory tests, laboratory values/results associated with the patient</th>
</tr>
</thead>
<tbody>
<tr>
<td>Method</td>
<td>GET</td>
</tr>
<tr>
<td>Parameters</td>
<td>Description</td>
</tr>
<tr>
<td>startdate</td>
<td>Start date (inclusive) to filter laboratory tests and results If no start date is specified:</td>
</tr>
<tr>
<td></td>
<td>• and no end date is specified, then all laboratory test and result records are returned</td>
</tr>
<tr>
<td></td>
<td>• and an end date is specified, then all laboratory test and result records prior to and including the end date are returned</td>
</tr>
<tr>
<td>endDate</td>
<td>End date (inclusive) to filter laboratory tests and results If no end date is specified:</td>
</tr>
<tr>
<td></td>
<td>• and no start date is specified, then all laboratory test and result records are returned</td>
</tr>
<tr>
<td></td>
<td>• and a start date is specified, then all laboratory test and result records after and including the start date are returned</td>
</tr>
</tbody>
</table>
# Response Fields

<table>
<thead>
<tr>
<th>Parent Field</th>
<th>Field</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>N/A</td>
<td>meta</td>
<td><strong>Type:</strong> Element&lt;br&gt;Encapsulates the meta data of the result</td>
</tr>
<tr>
<td>meta</td>
<td>date</td>
<td><strong>Type:</strong> Date&lt;br&gt;Date and time the response was generated&lt;br&gt;UTC ISO 8601 datetime with time zone in extended notation (e.g., 2007-04-05T14:30Z)</td>
</tr>
<tr>
<td>N/A</td>
<td>patient</td>
<td><strong>Type:</strong> Element&lt;br&gt;Encapsulates patient records</td>
</tr>
<tr>
<td>patient</td>
<td>patientId</td>
<td><strong>Type:</strong> String&lt;br&gt;Canonical textual representation of the patient's UUID</td>
</tr>
<tr>
<td>N/A</td>
<td>diagnosticReport</td>
<td><strong>Type:</strong> Array&lt;br&gt;Encapsulates the patient diagnostic reports</td>
</tr>
<tr>
<td>diagnosticReport</td>
<td>issued</td>
<td><strong>Type:</strong> Date&lt;br&gt;Date this report was released&lt;br&gt;ISO 8601 date (e.g., 2007-04-05)</td>
</tr>
<tr>
<td>diagnosticReport</td>
<td>status</td>
<td><strong>Type:</strong> String</td>
</tr>
<tr>
<td>diagnosticReport</td>
<td>observation</td>
<td><strong>Type:</strong> Element</td>
</tr>
<tr>
<td>observation</td>
<td>status</td>
<td><strong>Type:</strong> String</td>
</tr>
<tr>
<td>observation</td>
<td>issued</td>
<td><strong>Type:</strong> Date&lt;br&gt;ISO 8601 date (e.g., 2007-04-05)</td>
</tr>
<tr>
<td>observation</td>
<td>code</td>
<td><strong>Type:</strong> Element</td>
</tr>
<tr>
<td>code</td>
<td>code</td>
<td><strong>Type:</strong> String&lt;br&gt;LOINC code</td>
</tr>
<tr>
<td>code</td>
<td>text</td>
<td><strong>Type:</strong> String&lt;br&gt;Textual description of the result</td>
</tr>
</tbody>
</table>
### Example

```json
{
  "meta":{
    "date":"2007-04-05T14:30Z",
  },
  "patient":{
    "patientId": "1fc15e44-c6b3-44b7-94ad-d992fbe1c550"
  },
  "diagnosticReport":{
    "issued":"2013-10-20",
    "status":"final",
    "observation":{
      "status":"final",
      "issued":"2013-10-20",
      "code":{
        "code":"6690-2",
        "text":"WHITE BLOOD CELL COUNT"
      },
      "value":{
```
"valueQuantity":{
  "value":8.2,
  "unit":"Thousand/uL"
},
"interpretation":{
  "text":"Normal"
},
"referenceRange":{
  "text":"3.8-10.8",
  "comment":"No further comment"
},

"status":"final",
"issued":"2013-10-20",
"code":{
  "code":"789-8",
  "text":"RED BLOOD CELL COUNT"
},
"value":{
  "valueQuantity":{
    "value":3.66,
    "unit":"Million/uL"
  }
},
"interpretation":{
  "text":"Low"
},
"referenceRange":{
  "text":"3.80-5.10",
  "comment":"No further comment"
}
# Immunization

**Immunization** Retrieve a list of immunizations associated with the patient

**Request**  
https://api.kareo.com/clinical/v1/api/patient/immunization

**Method** GET

<table>
<thead>
<tr>
<th>Parameters</th>
<th>Description</th>
<th>Required</th>
<th>Example</th>
</tr>
</thead>
</table>
| `startdate` | Start date (inclusive) to filter immunization records  
If no start date is specified:  
• and no end date is specified, then all immunization records are returned  
• and an end date is specified, then all immunization records prior to and including the end date are returned | N | 04-13-1977 |
| `endDate` | End date (inclusive) to filter immunization records  
If no end date is specified:  
• and no start date is specified, then all immunization records are returned  
• and a start date is specified, then all immunization records after and including the start date are returned | N | 04-13-2004 |
### Response Fields

<table>
<thead>
<tr>
<th>Parent Field</th>
<th>Field</th>
<th>Description</th>
</tr>
</thead>
</table>
| N/A          | meta        | **Type:** Element  
Encapsulates the meta data of the result                                          |
| meta         | date        | **Type:** Date  
Date and time the response was generated  
UTC ISO 8601 datetime with time zone in extended notation  
(e.g., 2007-04-05T14:30Z)                                                                 |
| N/A          | patient     | **Type:** Element  
Encapsulates patient records                                                      |
| patient      | patientId   | **Type:** String  
Canonical textual representation of the patient's UUID                              |
| N/A          | immunization| **Type:** Array  
Encapsulates the patient immunizations                                               |
| immunization | code        | **Type:** String  
CVX code of the vaccine                                                             |
| immunization | name        | **Type:** String  
Textual representation of vaccine name                                               |
| immunization | date        | **Type:** Date  
Recording date  
ISO 8601 date (e.g., 2007-04-05)                                                   |
| immunization | status      | **Type:** String  
Possible Values:  
- “Administered”  
- “NonAdministered”  
- “History”  
- “Order” |
| immunization | lotNumber   | **Type:** String  
Vaccine lot number                                                                  |
| immunization | manufacturer| **Type:** String  
Vaccine manufacturer                                                                |
| immunization | notes       | **Type:** String  
Vaccination notes                                                                   |
Example

```
{
    "meta":{
        "date":"2007-04-05T14:30Z",
    },
    "patient":{
        "patientId": "1fc15e44-c6b3-44b7-94ad-d992fbe1c550"
    },
    "immunization":[
        {
            "code": "106",
            "name": "Tetanus and diphtheria toxoids",
            "date": "2012-01-04",
            "status": "Administered",
            "lotNumber": "2",
            "manufacturer": "Immuno Inc.",
            "notes": "N/A"
        },
        {
            "code": "166",
            "name": "influenza, intradermal, quadrivalent, preservative free",
            "date": "2015-06-22",
            "status": "Administered",
            "lotNumber": "No lot number",
            "manufacturer": "Immuno Inc.",
            "notes": "Immunization not given"
        },
        {
            "code": "104",
            "name": "Hepatitis A",
            "date": "2013-02-03",
            "status": "NonAdministered",
        }
    ]
}
```
# Medication Statement

**Medications**
Retrieval a list of medications associated with the patient

**Request**
https://api.kareo.com/clinical/v1/api/patient/medicationStatement

**Method**
GET

<table>
<thead>
<tr>
<th>Parameters</th>
<th>Description</th>
<th>Required</th>
<th>Example</th>
</tr>
</thead>
</table>
| startdate  | Start date (inclusive) to filter medication records  
If no start date is specified:  
• and no end date is specified, then all medication records are returned  
• and an end date is specified, then all medication records prior to and including the end date are returned | N | 04-13-1977 |
| endDate    | End date (inclusive) to filter medication records  
If no end date is specified:  
• and no start date is specified, then all medication records are returned  
• and a start date is specified, then all medication records after and including the start date are returned | N | 04-13-2004 |
## Response Fields

<table>
<thead>
<tr>
<th>Parent Field</th>
<th>Field</th>
<th>Description</th>
</tr>
</thead>
</table>
| N/A          | meta                   | Type: Element
Encapsulates the meta data of the result |
| meta         | date                   | Type: Date
Date and time the response was generated
UTC ISO 8601 datetime with time zone in extended notation
(e.g., 2007-04-05T14:30Z) |
| N/A          | patient                | Type: Element
Encapsulates patient records |
| patient      | patientId              | Type: String
Canonical textual representation of the patient’s UUID |
| medication-Statement | medication | Type: Array
Encapsulates the patient medications |
| medication-Statement | code                | Type: String
RxNorm code |
| medication-Statement | name                | Type: String |
| medication-Statement | dosage               | Type: Element
Encapsulates the medication dosage information |
| dosage       | sig                   | Type: String
Free text dosage information |
| medication-Statement | startDate           | Type: Date
ISO 8601 date (e.g., 2007-04-05) |
| medication-Statement | endDate             | Type: Date
ISO 8601 date (e.g., 2007-04-05) |
Example

```json
{
    "meta": {
        "date": "2007-04-05T14:30Z"
    },
    "patient": {
        "patientId": "1fc15e44-c6b3-44b7-94ad-d992fbe1c550"
    },
    "medicationStatement": [
        {
            "medication": {
                "code": "308177",
                "name": "amoxicillin 125 mg oral tablet, chewable"
            },
            "dosage": {
                "sig": "1 tab(s) orally once a day"
            },
            "startDate": "2017-08-23",
            "endDate": null
        },
        {
            "medication": {
                "code": "863538",
                "name": "penicillin G potassium 5,000,000 units injection"
            },
            "dosage": {
                "sig": "One inject per day"
            },
            "startDate": "2017-08-22",
            "endDate": "2017-08-30"
        }
    ]
}
```
### Binary / Summary

**Summary**
Retrieves a CCDA 2.1 document containing the data elements defined by the Common Clinical Data Set (CCDS)

**Request**

**Method**
GET

<table>
<thead>
<tr>
<th>Parameters</th>
<th>Description</th>
<th>Required</th>
<th>Example</th>
</tr>
</thead>
</table>
| startdate  | Start date (inclusive) to filter the various sections of the CCDA If no start date is specified:  
- and no end date is specified, then all section records are returned  
- and an end date is specified, then all section records prior to and including the end date are returned | N        | 04-13-1977   |
| endDate    | End date (inclusive) to filter various sections of the CCDA If no end date is specified:  
- and no start date is specified, then all section records are returned  
- and a start date is specified, then all section records after and including the start date are returned | N        | 04-13-2004   |
Response Fields

<table>
<thead>
<tr>
<th>Parent Field</th>
<th>Field</th>
<th>Description</th>
</tr>
</thead>
</table>
| N/A          | meta     | Type: Element  
Encapsulates the meta data of the result |
| meta         | date     | Type: Date  
Date and time the response was generated  
UTC ISO 8601 datetime with time zone in extended notation  
(e.g., 2007-04-05T14:30Z) |
| N/A          | contentType | Type: String  
MIME type of the content |
| N/A          | content  | Type: String  
Base64 encoded CCDA 2.1 document |

Example

```json
{
    "meta": {  
        "date": "2007-04-05T14:30Z",
    },  
    "contentType": "application/xml",  
    "content": "[Actual value ommitted for example brevity]"
}
```