

## DICOM Correction Proposal

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|---------------------|---|
| Status              | Final Text                                  |
| Date of Last Update | 2015/11/11                                  |
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| Submission Date     | 2015/05/15                                  |

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| Correction Number  | CP1506 |
| Log Summary: QIDO-RS maximumResults  |        |
| Name of Standard<br>PS3.18 2015c   |        |
| <p>Rationale for Correction:</p> <p>Section 6.7.1.2 “Response:”</p> <p style="padding-left: 40px;">If the limit query key is not specified or its value exceeds the total number of matching results then {maximumResults} is the lesser of the number of matching results and the maximum number of results supported by the Server.</p> <p style="padding-left: 40px;">If the offset query key is not specified or its value is less than zero then {skippedResults} is zero.</p> <p style="padding-left: 40px;">The first result returned shall be result number ({skippedResults} + 1). The last result returned shall be result number ({skippedResults} + {maximumResults}). If ({skippedResults} + 1) exceeds {maximumResults} then no results are returned.</p> <p>Issue 1:</p> <p style="padding-left: 40px;">Parts of this definition imply that maximumResults limits the number of results available to be returned, and skippedResults is an offset into that collection. Other parts (yellow highlight) imply that maximumResults limits the number of results returned in a particular query, without impacting the total number of results being made available.</p> <p>Issue 2:</p> <p style="padding-left: 40px;">The text describing the warning is confusing.</p> <p>Issue 3:</p> <p style="padding-left: 40px;">The default values for “limit” and “offset” parameters were not clearly defined “offset” or undefined “limit”.</p> <p>Issue 4:</p> <p style="padding-left: 40px;">The Note adds no value, since it the most of the section actually defines how a “client can request additional results by specifying a value for the ‘offset’ query key.”</p> |        |
| Correction Wording:  |        |

*Update PS 3.18 section 6.7.1.1 as indicated below.*

### 6.7.1.1 Request

...

- fuzzymatching=true | false
- limit={limit}{maximumResults}

**The “limit” parameter value is an unsigned integer, which specifies the maximum number of results the origin server should return. If the “limit” parameter is not present, its value is 50**

- ~~offset={offset}{skippedResults}~~

**The “offset” parameter value is an unsigned integer, which specifies the number of results the origin server should skip before the first returned result. If the “offset” query parameter is not present, its value is 0.**

Replace PS 3.18 section 6.7.1.2 with the following

### 6.7.1.2 Response

The origin server shall perform the query indicated in the request

The search requests shall be idempotent, that is, two separate search requests with the same target resource, query parameters, and header fields shall return the same ordered list of results, if the set of matching results on the origin server has not changed.

The results returned in the response are determined as follows:

*M* is the number of matches resulting from the search.  
*smax* is the maximum number of results the origin server allows in a single response.  
*offset* is the value of the “offset” query parameter. It is the index of the first element in *results*.  
*R* is the length of the returned *results*. It is equal to the minimum of:  
    *M*-*offset* – the length of available matches starting at *offset*,  
    *smax*-*offset* – the length before reaching *smax*, and  
    *limit* – the value of the “limit” query parameter.  
*remaining* is the number of remaining matches. It is equal to:  $M - (offset + R)$ .

The response is determined as follows:

If ( $R \leq 0$ ) then there were no matches, and a 204 (No Content) response shall be returned with an empty payload.

Otherwise, a 200 (OK) response shall be returned with a payload containing *results*.

If (*remaining* > 0) the response shall include a Warning header field (see RFC7230, Section 14.46) containing the following:

Warning: 299 {+service}: There are <remaining> additional results that can be requested.

If the set of matching results has changed due to changes in the origin server contents, then the ordered list of results may be different for subsequent transactions with identical requests, and the results of using the “limit” and “offset” parameters may be inconsistent.

The response will be in an Acceptable Media Type.