

Hydrografi Nedladdning v1.1 - teknisk beskrivning



Dokumentversion 1.1

1.1. Gränssnittsdefinition

1.1.1.1.1. Åtkomstpunkt

Atomflöde Produktion	http://download.lantmateriet.se/hydrografi/atom/v1.1/
Atomflöde Verifiering	http://download-ver.lantmateriet.se/hydrografi/atom/v1.1/

1.2. Inspire

1.2.1.1.1. Information

Inspire Hydrography Dataspecifikation	http://inspire.jrc.ec.europa.eu/documents/Data_Specifications/INSPIRE_DataSpecification_HY_v3.1.pdf
Inspire tekniska riktlinjer	http://inspire.jrc.ec.europa.eu/documents/Network_Services/Technical_Guidance_Download_Services_v3.1.pdf

1.2.1.1.2. Schema

Inspire Hydrografi Fysiskt Vatten	http://inspire.ec.europa.eu/schemas/hy-p/4.0/HydroPhysicalWaters.xsd
Inspire Hydrografi Nätverk	http://inspire.ec.europa.eu/schemas/hy-n/4.0/HydroNetwork.xsd

1.3. Svensk Vattenstandard

1.3.1.1.1. Information

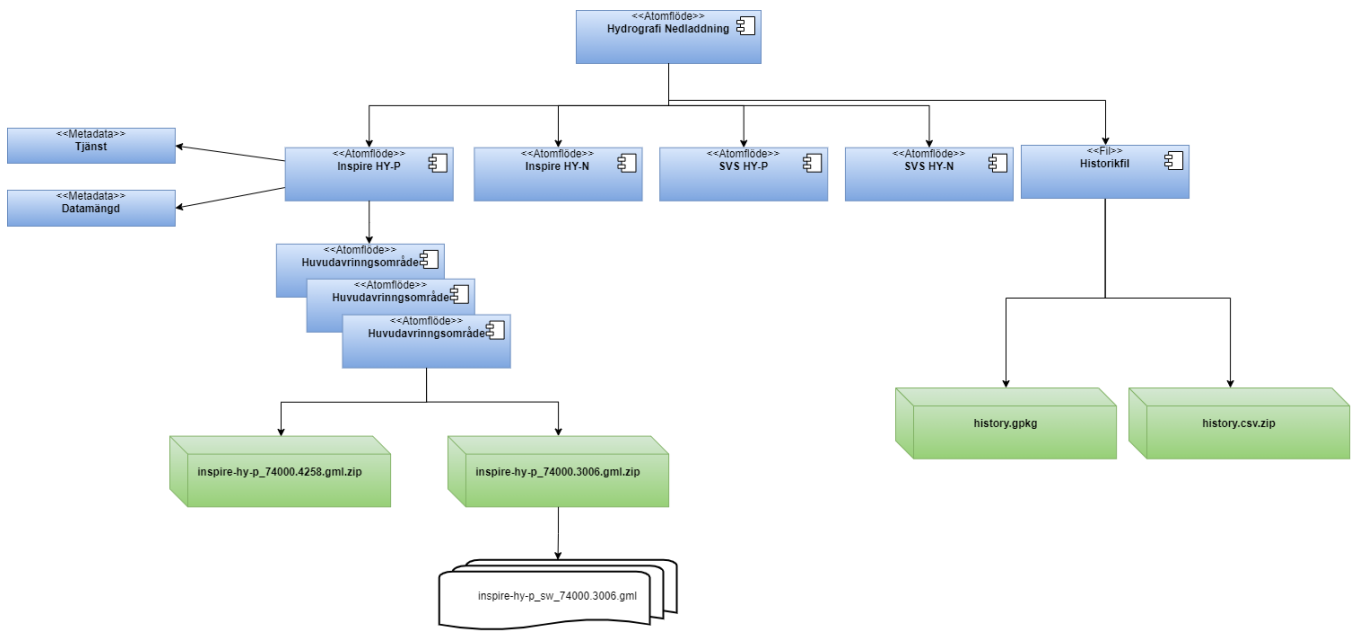
Svensk Vattenstandard	https://www.sis.se/produkter/informationsteknik-kontorsutrustning/allmant/ss6370082015/
-----------------------	---

1.3.1.1.2. Schema

Svensk Vattenstandard Fysiskt Vatten	http://resource.sgu.se/data/schemas/ss637008/ws_phwater/1.0/ws_physicalWater.xsd
Svensk Vattenstandard Nätverk	http://resource.sgu.se/data/schemas/ss637008/ws_network/1.0/ws_network.xsd

1.4. Atomflöde

1.4.1. Logisk struktur



1.4.2. Exempel

1.4.2.1.1. Atomflöde för tema, Inspire Hydrography Physical Waters

Exempel

```
<feed xmlns:georss="http://www.georss.org/georss" xmlns="http://www.w3.org/2005/Atom" xmlns:inspire_dls="
http://inspire.ec.europa.eu/schemas/inspire_dls/1.0" xml:lang="sv">
  <id>http://download.lantmateriet.se/hydrografi/atom/v1.1/inspire/hyp</id>
  <title>Inspire Hydrography Physical Waters</title>
  <subtitle>Fördefinierade datamängder för Inspire Hydrography Physical Waters</subtitle>
  <updated>2021-04-30T19:14:42+02:00</updated>
  <link href="http://download.lantmateriet.se/hydrografi/atom/v1.1/inspire/hyp" rel="self" type="
application/atom+xml" hreflang="sv" title="Detta dokument"/>
  <link href="https://www.geodata.se/geodataportalen/srv/swe/csw-inspire?
request=GetRecordById&service=CSW&version=2.0.2&elementSetName=full&outputSchema=csw:IsoRecord&id=353facbc-3f7d-
4273-8ca6-b1a7f3265556" rel="describedby" type="application/vnd.iso.19139+xml" hreflang="sv" title="Metadata,
nedladdningstjänst för Inspire Hydrography Physical Waters"/>
  <link href="https://www.geodata.se/geodataportalen/GetMetaDataById?id=353facbc-3f7d-4273-8ca6-
b1a7f3265556" rel="alternate" type="text/html" hreflang="sv" title="Metadata, nedladdningstjänst för Inspire
Hydrography Physical Waters (HTML)"/>
  <rights>Produkten omfattas av upphovsrätt. Avtal för användning krävs, avgifter för användning tas ut.
Användningen förutsätter ändamålsprövning.</rights>
  <author>
    <name>Geodatasupport</name>
    <email>geodatasupport@lm.se</email>
  </author>
  <entry>
    <id>http://download.lantmateriet.se/hydrografi/atom/v1.1/inspire/hyp/74000</id>
    <title>Inspire Hydrography Physical Waters, Emån (74000)</title>
    <summary>Fördefinierad datamängd Inspire Hydrography Physical Waters, huvudavrinningsområde
Emån (74000)</summary>
    <updated>2021-04-30T15:11:21+02:00</updated>
    <inspire_dls:spatial_dataset_identifier_code>74000</inspire_dls:spatial_dataset_identifier_code>
    <inspire_dls:spatial_dataset_identifier_namespace>SE.LM.HY</inspire_dls:
spatial_dataset_identifier_namespace>
    <link href="http://download.lantmateriet.se/hydrografi/atom/v1.1/inspire/hyp/74000" rel="
alternate" type="application/atom+xml" hreflang="sv" title="Inspire Hydrography Physical Waters, Emån (74000)"/>
    <link href="https://www.geodata.se/geodataportalen/srv/swe/csw-inspire?
request=GetRecordById&service=CSW&version=2.0.2&elementSetName=full&outputSchema=csw:IsoRecord&id=a2acb721-a900-
42e7-9386-90f712836e64" rel="describedby" type="application/vnd.iso.19139+xml" hreflang="sv" title="Metadata
för datamängden Inspire Hydrography Physical Waters"/>
    <link href="https://www.geodata.se/geodataportalen/GetMetaDataById?id=a2acb721-a900-42e7-9386-
90f712836e64" rel="alternate" type="text/html" hreflang="sv" title="Metadata för datamängden Inspire
Hydrography Physical Waters (HTML)"/>
    <category term="http://www.opengis.net/def/crs/EPSSG/0/3006" label="SWEREF99 TM"/>
    <category term="http://www.opengis.net/def/crs/EPSSG/0/4258" label="ETRS89"/>
    <georss:polygon>14.6187643884164 57.0919842683089 16.5049700972789 57.0919842683089
16.5049700972789 57.7967590865266 14.6187643884164 57.7967590865266 14.6187643884164 57.0919842683089</georss:
polygon>
  </entry>
  ...
</feed>
```

1.4.2.1.2. Atomflöde för datamängd (Emån), Inspire Hydrography Physical Waters

Exempel

```
<feed xmlns:georss="http://www.georss.org/georss" xmlns="http://www.w3.org/2005/Atom" xmlns:inspire_dls="
http://inspire.ec.europa.eu/schemas/inspire_dls/1.0" xml:lang="sv">
  <id>http://download.lantmateriet.se/hydrografi/atom/v1.1/inspire/hyp/74000</id>
  <title>Fördefinierad datamängd Inspire Hydrography Physical Waters, Emån (74000)</title>
  <subtitle>Fördefinierad datamängd i olika referenssystem och format</subtitle>
  <updated>2021-04-30T15:11:21+02:00</updated>
  <link href="http://download.lantmateriet.se/hydrografi/atom/v1.1/inspire/hyp/74000" rel="self" type="
application/atom+xml" hreflang="sv" title="Detta dokument"/>
  <link href="http://download.lantmateriet.se/hydrografi/atom/v1.1/inspire/hyp" rel="up" type="application
/atom+xml" hreflang="sv" title="Inspire Hydrography Physical Waters"/>
  <link href="http://inspire.ec.europa.eu/featureconcept/Lock/" rel="describedby" type="text/html" title="
Featurtype Lock"/>
  <link href="http://inspire.ec.europa.eu/featureconcept/LandWaterBoundary/" rel="describedby" type="text
/html" title="Featurtype Land-Water Boundary"/>
  <link href="http://inspire.ec.europa.eu/featureconcept/Shore/" rel="describedby" type="text/html"
title="Featurtype Shore"/>
  <link href="http://inspire.ec.europa.eu/featureconcept/StandingWater/" rel="describedby" type="text
/html" title="Featurtype Standing Water"/>
  <link href="http://inspire.ec.europa.eu/featureconcept/DrainageBasin/" rel="describedby" type="text
/html" title="Featurtype Drainage Basin"/>
  <link href="http://inspire.ec.europa.eu/featureconcept/Rapids/" rel="describedby" type="text/html"
title="Featurtype Rapids"/>
  <link href="http://inspire.ec.europa.eu/featureconcept/Ford/" rel="describedby" type="text/html" title="
Featurtype Ford"/>
  <link href="http://inspire.ec.europa.eu/featureconcept/ShorelineConstruction/" rel="describedby" type="
text/html" title="Featurtype ShorelineConstruction"/>
  <link href="http://inspire.ec.europa.eu/featureconcept/Wetland/" rel="describedby" type="text/html"
title="Featurtype Wetland"/>
  <link href="http://inspire.ec.europa.eu/featureconcept/Sluice/" rel="describedby" type="text/html"
title="Featurtype Sluice"/>
  <link href="http://inspire.ec.europa.eu/featureconcept/Falls/" rel="describedby" type="text/html"
title="Featurtype Falls"/>
  <link href="http://inspire.ec.europa.eu/featureconcept/Watercourse/" rel="describedby" type="text/html"
title="Featurtype Watercourse"/>
  <link href="http://inspire.ec.europa.eu/featureconcept/DamOrWeir/" rel="describedby" type="text/html"
title="Featurtype Dam Or Weir"/>
  <rights>Produkten omfattas av upphovsrätt. Avtal för användning krävs, avgifter för användning tas ut.
Användningen förutsätter ändamålsprövning.</rights>
  <author>
    <name>Geodatasupport</name>
    <email>geodatasupport@lm.se</email>
  </author>
  <entry>
    <id>http://download.lantmateriet.se/hydrografi/atom/v1.1/inspire/hyp/74000/dataset?
srs=3006&format=application/zip</id>
    <title>Inspire Hydrography Physical Waters, Emån (74000) [EPSG:3006, GML]</title>
    <updated>2021-04-30T15:09:43+02:00</updated>
    <link href="http://download.lantmateriet.se/hydrografi/atom/v1.1/inspire/hyp/74000/dataset?
srs=3006&format=application/zip" rel="alternate" type="application/zip" hreflang="sv" title="inspire-hyp_74000.
3006.gml.zip" length="17078771"/>
    <category term="http://www.opengis.net/def/crs/EPSSG/0/3006" label="SWEREF99 TM"/>
  </entry>
  <entry>
    <id>http://download.lantmateriet.se/hydrografi/atom/v1.1/inspire/hyp/74000/dataset?
srs=4258&format=application/zip</id>
    <title>Inspire Hydrography Physical Waters, Emån (74000) [EPSG:4258, GML]</title>
    <updated>2021-04-30T15:11:21+02:00</updated>
    <link href="http://download.lantmateriet.se/hydrografi/atom/v1.1/inspire/hyp/74000/dataset?
srs=4258&format=application/zip" rel="alternate" type="application/zip" hreflang="sv" title="inspire-hyp_74000.
4258.gml.zip" length="27712067"/>
    <category term="http://www.opengis.net/def/crs/EPSSG/0/4258" label="ETRS89"/>
  </entry>
</feed>
```

1.4.2.1.3. Datamängd GML (Emån), Inspire Hydrography Physical Waters (StandingWater)

Exempel

```
<?xml version="1.0" encoding="UTF-8"?>
<wfs:FeatureCollection xmlns:hy-p="http://inspire.ec.europa.eu/schemas/hy-p/4.0" xmlns:hy="http://inspire.ec.europa.eu/schemas/hy/4.0" xmlns:gn="http://inspire.ec.europa.eu/schemas/gn/4.0" xmlns:base="http://inspire.ec.europa.eu/schemas/base/3.3" xmlns:xlink="http://www.w3.org/1999/xlink" xmlns:gmd="http://www.isotc211.org/2005/gmd" xmlns:fes="http://www.opengis.net/fes/2.0" xmlns:gml="http://www.opengis.net/gml/3.2" xmlns:ows="http://www.opengis.net/ows/1.1" xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance" xmlns:wfs="http://www.opengis.net/wfs/2.0" xsi:schemaLocation="http://www.opengis.net/wfs/2.0 http://schemas.opengis.net/wfs/2.0/wfs.xsd http://www.opengis.net/gml/3.2 http://schemas.opengis.net/gml/3.2.1/gml.xsd" timeStamp="2021-04-30T14:58:57.268963381+02:00" numberMatched="2804" numberReturned="2804">
  <wfs:boundedBy>
    <gml:Envelope srsName="http://www.opengis.net/def/crs/EPSG/0/3006">
      <gml:lowerCorner>6328986.630 478218.128</gml:lowerCorner>
      <gml:upperCorner>6403623.386 589908.053</gml:upperCorner>
    </gml:Envelope>
  </wfs:boundedBy>
  <wfs:member>
    <hy-p:StandingWater gml:id="SE.LM.HY.8a91909a-40cf-4bfd-bbe7-078710f90481">
      <hy-p:geographicalName>
        <gn:GeographicalName>
          <gn:language>swe</gn:language>
          <gn:nativeness xlink:href="http://inspire.ec.europa.eu/codelist/NativenessValue/endonym"/>
          <gn:nameStatus xlink:href="http://inspire.ec.europa.eu/codelist/NameStatusValue/official"/>
          <gn:sourceOfName>Swedish Place Name Registry - Ortnamnsregistret</gn:sourceOfName>
          <gn:spelling>
            <gn:SpellingOfName>
              <gn:text>Vigotten</gn:text>
              <gn:script>latn</gn:script>
            </gn:SpellingOfName>
          </gn:spelling>
        </gn:GeographicalName>
      </hy-p:geographicalName>
      <hy-p:hydroId>
        <hy:HydroIdentifier>
          <hy:localId>8a91909a-40cf-4bfd-bbe7-078710f90481</hy:localId>
          <hy:namespace>SE.LM.HY</hy:namespace>
        </hy:HydroIdentifier>
      </hy-p:hydroId>
      <hy-p:beginLifespanVersion>2019-06-13T11:11:18+02:00</hy-p:beginLifespanVersion>
      <hy-p:geometry>
        <gml:Surface gml:id="SE.LM.HY.8a91909a-40cf-4bfd-bbe7-078710f90481_SW_GEOMETRY" srsName="http://www.opengis.net/def/crs/EPSG/0/3006" srsDimension="2">
          <gml:patches>
            <gml:PolygonPatch>
              <gml:exterior>
                <gml:LinearRing>
                  <gml:posList>...</gml:posList>
                </gml:LinearRing>
              </gml:exterior>
              <gml:interior>
                <gml:LinearRing>
                  <gml:posList>...</gml:posList>
                </gml:LinearRing>
              </gml:interior>
            </gml:PolygonPatch>
          </gml:patches>
        </gml:Surface>
      </hy-p:geometry>
      <hy-p:inspireId>
        <base:Identifier>
          <base:localId>8a91909a-40cf-4bfd-bbe7-078710f90481</base:localId>
          <base:namespace>SE.LM.HY</base:namespace>
        </base:Identifier>
      </hy-p:inspireId>
    </hy-p:StandingWater>
  </wfs:member>
</wfs:FeatureCollection>
```

```

    <hy-p:levelOfDetail owns="false">
      <gmd:MD_Resolution>
        <gmd:equivalentScale>
          <gmd:MD_RepresentativeFraction>
            <gmd:denominator>
              <gco:Integer xmlns:gco="http://www.isotc211.org
/2005/gco">10000</gco:Integer>
              </gmd:denominator>
            </gmd:MD_RepresentativeFraction>
          </gmd:equivalentScale>
        </gmd:MD_Resolution>
      </hy-p:levelOfDetail>
      <hy-p:localType>
        <gmd:LocalisedCharacterString>sjö</gmd:LocalisedCharacterString>
      </hy-p:localType>
      <hy-p:origin>natural</hy-p:origin>
      <hy-p:persistence xlink:href="http://inspire.ec.europa.eu/codelist
/HydrologicalPersistenceValue/perennial"/>
      <hy-p:tidal>>false</hy-p:tidal>
      <hy-p:drainsBasin xsi:nil="true" nilReason="other:unpopulated"/>
      <hy-p:elevation uom="m">220</hy-p:elevation>
      <hy-p:meanDepth uom="m" xsi:nil="true" nilReason="other:unpopulated"/>
      <hy-p:surfaceArea uom="m2">1059661</hy-p:surfaceArea>
    </hy-p:StandingWater>
  </wfs:member>
  ...
</wfs:FeatureCollection>

```