



The Global Language of Business

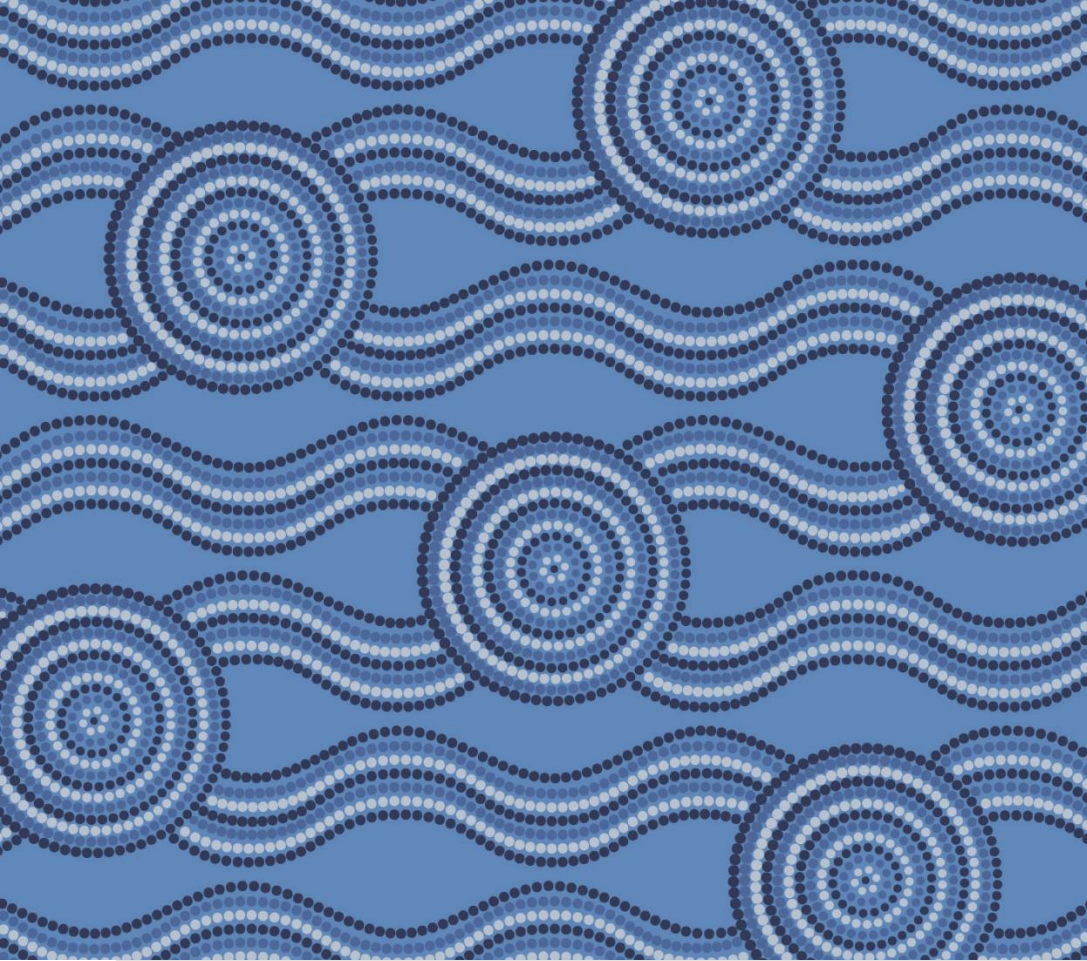
Healthcare NPC Advisory Group (HCNPCAG)

2Q 2023 meeting

18th May 2023 (1.00pm - 3.30pm)



Working together to continuously **improve** the National Product Catalogue for the **whole of Australian healthcare**



We acknowledge the Traditional Custodians of the various lands on which we meet and work today and any First Nations' people that may be participating in this meeting.

Specifically, we acknowledge the people of the Kulin and Eora nations, where GS1 offices are located, and pay our respects to elders past, present and emerging.

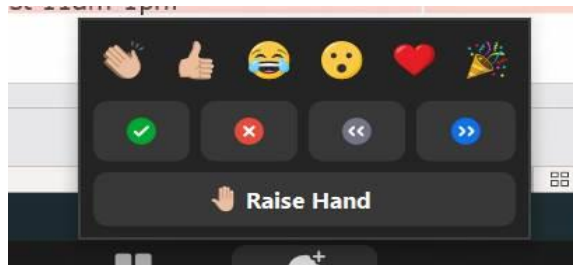
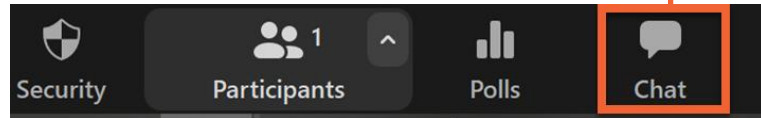
We recognise and celebrate the diversity of First Nations' people, and their ongoing cultures and connections to the lands and waters across Australia.

Your opinion matters



Click the bar at the bottom of your screen for the chat window or raise your hand to ask a question – all feedback is encouraged

Click here



We will be seeking votes on actions related to the 'Reimagining' improvements being proposed during the meeting via 'Polls'. Please make sure you enter your response when the polls pop up on screen

Proposed change to the 'Ready' process

Poll | 1 question

1. Do you support the proposed simplification of the supplier 'Ready' process to make it easier for them to publish their data to more trading partners (Single Choice) *

- Yes
- No
- Yes but I would like more information

Session will be recorded

Trade Practices Compliance Notice



GS1 Australia Trade Practice Compliance Notice

Participants on GS1 Boards, committees, task forces, work groups, or other similar bodies, must always remember the purpose of the Board, committee, task force, or work group is to enhance the ability of all industry members to compete more efficiently and effectively to provide better value to the consumer or end user. GS1 activity almost always involves the cooperation of competitors; therefore great care must be taken to assure compliance with trade practices laws in Australia and in other jurisdictions

This means:

- Participation must be voluntary.
- There will no exchange of confidential information such as prices products.
- Meetings will have a pre-prepared agenda and recorded by minutes.
- All recommendations from any meeting are recommendations only. Individual companies remain free to make independent, competitive decisions.
- Any standards developed must be voluntary standards.
- If any participant believes the group is drifting toward impermissible discussion, the topic shall be tabled until the opinion of lawyer(s) with experience in trade practices law can be obtained.

Healthcare NPC Advisory Group Agenda



Time	Subject		Who
1.10 pm	HCNPCAG Action Log and Chair Nominations	10 min	Deb
1:20 pm	Member Topics – Use of Dangerous Goods and GHS in Healthcare	15 min	Stanley So (HSV)
1:35 pm	Healthcare Re-imagined – System Load / Sending Data (supplier side enhancements)	20 min	Deb / Murray / Ramesh
1.55 pm	Healthcare Re-imagined – Receiving Data (recipient Side enhancements)	20 min	Deb / Murray / Ramesh
2:15 pm	Updates from Healthcare Item Data Lake Participants - API / HIDL use cases (proof of concept)	30 min	Long Lam / Andrew Tempest/Paul Davies / Matthew Senz
2:45 pm	Healthcare Re-imagined – Data Quality	20 min	Deb / Murray / Ramesh
3:05 pm	Data Quality Reports – a Brief Intro	15 min	Sascha / Emily
3.30 pm	Meeting Adjourned		

Welcome & introductions

10 Min



Note: Today's meeting will be recorded for the purposes of preparing minutes

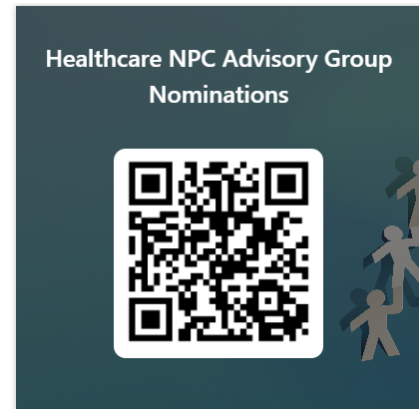
New Attendees and New Co-chair Nominations



- GS1 – we want to take a moment and thank all of you who have provided your feedback being part of the various subgroups. It is what has helped us move the dial forward on the various healthcare initiatives.
- We want to welcome Yi-han and Aileen from CSIRO – attending today.
- We also have Caroline Wong joining us today from Healthshare NSW

- Peter Wilson and Elizabeth Donahue no longer co-chair of the advisory group. In a second, we will share a link or scan the QR code to get your nominations for our new co-chairs. Ideally, we have 2 nominations for co-chair for the HCNPCAG

Link: <https://forms.office.com/r/vL06xp6udF>



Topics Raised by Members

Timing:

5min – presentation

5 min – discussion

5 min polling



Note: Today's meeting will be recorded for the purposes of preparing minutes

The HCNPCAG provides good representation across the sector.
And we would like the members of the Healthcare NPC advisory group to provide their feedback on topics they want raised in this forum where sector discussion would be beneficial.

New topics or feedback on existing ones can be emailed to **healthcareteam@gs1au.org**

Additionally, with the nomination form we will also include a section where you can provide member topics and from there, we will liaise with individual members to represent them in this forum.

HSV Requirement for Dangerous Goods



Summary

Outcomes for the Discussion



- HealthShare Victoria requires supply chain data for their Distribution Centre
- Onus is on the supplier to provide safety data sheets – currently not mandated.
- Important to have Class of Dangerous Goods and Subsidiary Codes.
- Specific product types include Consumer Cleaning and sanitizers.
- Currently all Transport Dangerous Goods and GHS data is available on the NPC.



- How are other members currently engaging their suppliers for this data?
- what data are they using?
- Is there awareness around the GHS requirements from a product safety perspective
- What products need data and how can we leverage the NPC to source it
- Which Code Lists are currently used by the industry?

• ***What are the key outcomes/take aways for suppliers and recipients?***

• ***What role do you want GS1 to play in supporting this?***

HSV Requirement for Dangerous Goods



POLL →

Do the HCNPCAG need alignment from the sector and focus on this topic for next AG?

- Yes
- No
- N/A

Declarations	
Dangerous Goods Information	Is Trade Item A Dangerous Good
	Is Trade Item A Hazardous Good
	Class of Dangerous Goods
	Class of Dangerous Goods Subsidiary Code
	Dangerous Goods Hazardous Code
	Dangerous Goods Packing Group
	Dangerous Goods Regulation Code
	Dangerous Goods Shipping Name
	Dangerous Goods Technical Name
	United Nations Dangerous Goods Number
Flash point	Flash Point Temperature + UOM
Safety Data Sheets	Referenced File Type Code = "SAFETY_DATA_SHEET"
	Uniform Resource Identifier
Globally Harmonised System (GHS)	GHS Signal Words Code
	GHS Symbol Description Code
	Hazard Statement Code
	Hazard Statement Description
	Precautionary Statements Code
	Precautionary Statements Description
	GHS Hazard Category

Healthcare Re-imagined – sending data

20 min



Summary of Healthcare Re-imagined



Healthcare re-imagined is a program delivering enhancements / solutions based on consultation with members in the HCNPCAG. This is currently in its second year with themes around

- A. Suppliers loading data,
- B. Recipients receiving data
- C. And Data Quality

All sub-working groups around healthcare re-imagined for (A) and (B) have been closed on the 11th April 2023. In the following slides, we will talk about where we are at with delivering these requirements.

Pre-read distributed 15th May

Healthcare Re-Imagined – System Load (20m)



Supplier side – System Improvements

- 1.1 NPC Xpress for Healthcare
- 1.1 NPC Publisher - Customized Spreadsheet download for Healthcare
- 1.1 NPC Publisher - Dynamic UI
- 1.2 XML Implementation Options
- 2.1 Training and Documentation (Workgroup Review Completed)
- 2.2 Interim Item
- 2.3 Distributor Model

1.1 NPC Xpress + Spreadsheet Download

On hold (HCNPCAG – Xpress not a high priority)

We are re-platforming to a low code/no code system and plan a future roll-out within healthcare.

NPC Xpress

NPC Publisher

XML Upload Options

Middleware Providers

1.1 Dynamic UI

Delivered - Allows suppliers to customize their UI experience on NPC Publisher by only showing recommended attributes.

Suppliers can choose to turn this feature on. To be communicated.

1.2 XML Implementation Options

Delivered -Review XML options to more readily enable data to be managed from supplier's PIM to NPC directly.

2.2 Preliminary Item

Delayed 23/08 - Interim load capability for products where not all attributes are available when product is created, but there is urgency to set up a basic product record.

Murray to provide an update

2.3 Distributor Model

Delayed 23/08 - Remove requirement for a Distributor to reload a complete record of a supplier/sponsor data, and instead define data requirements for a Distributor which relate to their product's ID, their sales units, their pricing only

Murray to provide an update

Preliminary Item - Recap & Update



When a publisher is aware that they do not have final or confirmed values for a new product that they wish to share with their trading partners, the publisher has two options.

1. Delay the uploading and publishing of the new product (item + price)
2. Upload the new product knowing that attribute values may need to be corrected and or additional data provided

The new Preliminary Item Model is designed to address the issue by,

- Allowing a supplier to nominate a new Item as a 'Preliminary' record
 - With the exception of a small number of attributes, primarily product identification, the Preliminary model allows a publisher to populate only the attributes with known and confirmed values.
- The items 'Start Availability Date', becomes the trigger by which time a full, non Preliminary Item record is to be submitted. A new business validation rule is to be introduced to ensure compliance.

Targeting Aug 23 release

- Revised release plan will provide GS1 with the necessary time to develop the Distributor Model functionality within NPC Publisher. Original May deployment plan was for suppliers using middleware only.

Preliminary Model T2M



POLL →

We are looking to implement the Pre-liminary Model with suppliers and recipients, we would like some expression of interest from the community on who would like to be involved in an initial pilot?

- **Yes**
- **No**
- **N/A**



Distributor Data Model - Recap & Update



Today, healthcare 'Distributors' must publish to their NPC recipients, **full & complete** NPC records.

The challenge for 'Distributors' is that although responsible, they are fully reliant on the Brand Owner or Product Sponsor to provide the Distributor with **complete, accurate** and **timely** information.

The new Healthcare Distributor Model is designed to address the issue by,

- Allowing Distributors to publish a 'Thin' item record, flagged as a 'Distributor Only' record
 - No change to pricing
- Request all Product Sponsors and or Brand Owners to publish & maintain full item records
 - Publications to NPC data recipients
 - Publish to the Healthcare Item Data Lake

Targeting Aug 23 release

- Revised release plan will provide GS1 with the necessary time to develop the Distributor Model functionality within NPC Publisher. Original May deployment plan was for suppliers using middleware only.

Distributor Model T2M



- What does a rollout look like?
 - **CPP Solution Partners** to be part of the Rollout for suppliers. Discussions to occur June 2023.
 - **Healthcare Recipients** on this call have agreed to receive a distributor record.
 - Healthcare recipients would need to be ready to receive 2 records for the 1 GTIN
 - Distributor
 - Sponsor
 - Healthcare recipients to provide this as an option to their distributors.
 - **For distributors** who want to adopt this model in Healthcare to agree to a rollout with the manufacturers will need to provide a sponsor record on the National Product Catalogue (and Data Lake) and publish to the Healthcare Recipients.
 - We have had discussions with some of the NPC distributors already. Some continue to use their current solutions which are working for them.

POLL →

August onwards we are looking for Recipients or Distributors to pilot this. We will reach out to you but we would be keen to get an expression of interest if you would want to discuss how this would work for you.

- **Yes**
- **No**
- **N/A**



Healthcare Reimagined – Receive Data

Presenter slides 10 min

Discussion 10 min



Healthcare Re-Imagined – System Receiving Data



Recipient side – System Improvements



- 4.1 NPC Tender Tool
- 5.2 NPC Recipient UI Improvements
- 5.3 Healthcare Item Data Lake
- 5.5 Recipient Documentation (Recipient Mapping Options)

4.1 Tender Tool (spreadsheet download)

The Tendering process is one area where users have identified a duplication of data creation as the Tender response or Pricing sheets mirror much of the data within the NPC.

Delivered – Upcoming update by Murray

5.2 NPC Recipient UI Improvements

Provide improved UI for non-integrated recipients to enable greater capability to use data

WIP – Shared requirements Waiting on 3rd Party (Atrify)

5.3 Healthcare Item Data Lake

WIP – Technical build delivered and ready in Beta but Prod will be w.c. 22 May. Data for HIDL will start to arrive in the Prod Lake after the May NPC GDSN release.

5.3 Recipient Documentation

WIP – Documentation underway. Estimate delivery by end of may for a first draft.

Healthcare Tender Spreadsheet - Recap & Update



- New download option within NPC Publisher – ‘Excel - Healthcare Tenders’
- Key Features (simplicity)
 - Single worksheet
 - Download only
 - Item only
 - Lowest level only (selection within NPC Publisher may include all packaging levels)
 - Simple report headers (single row)
 - Forty attributes
 - Data attributes that are ‘common’ to most healthcare tender submissions
 - Excludes qualifiers & UOM’s, outputs descriptions instead of codes

Targeting Aug 23 release

Healthcare Tender Spreadsheet – T2M



- Healthcare Recipients on this call have agreed to for GS1 to develop the tender spreadsheet.
- How would healthcare recipients on this call like to support the adoption internally of this?
- Following AG – GS1 to create a demo on the tendering tool for your business to review and share internally

POLL →

How frequently do you login to the NPC and would you be likely to download a tender spreadsheet to use?

- **Regularly**
- **Rarely**
- **Never**
- **N/A**



Healthcare Item Data Lake – Technical Update



- The solution is deployed into the beta environment.

Search Healthcare Item Data Lake API ▼

POST /healthcareitemdatalake/search Search the HIDL for product data published to the NPC by suppliers 🔒

Get XML ▼

GET /healthcareitemdatalake/getXMLData Request for the full product data by the GLN and the GTIN in GS1 XML 🔒

GET /healthcareitemdatalake/getXMLDataById/{ID} Request for full product payload data by the id in GS1 XML. The id returned in the response from the search 🔒

Get JSON ▼

GET /healthcareitemdatalake/getJSONData Request for the full product data by the GLN and the GTIN in JSON 🔒

GET /healthcareitemdatalake/getJSONDataById/{ID} Request for full product payload data by the id in JSON. The id returned in the response from the search 🔒

- data availability from the data lake is determined by:
 - The community visibility date of the product provided by the supplier.
 - Product data publication / un-publication status
- Plan to deploy into the production environment towards the week of 22nd May.

Healthcare Item Data Lake - T2M



Opt-in/Opt-out update

- 3 EDMs have been sent. Feedback from some suppliers was that they have not read or seen it. But would be keen to publish
- Require response by 15th June. From there we will begin the publications 1 July

Breakdown by Classification

- Devices 8103
- Medicines 508
- Healthcare Other 69
- Consumer Goods 121

Total number of suppliers responded to Opt-in

- 9% (of 622) Healthcare suppliers have responded to the EDM.
- 47 of Healthcare supplier's data is in process of being published or published

Number of GTINs published to the Lake:

- 8802 in the lake as of 17/05/2023

Healthcare Item Data Lake - T2M



Some jurisdictions have offered to support a campaign to bring suppliers onto the HIDL before early July. Ideally this should be all jurisdictions – suppliers are more attentive to messages delivered by their customers, rather than from GS1 Australia.

Message:

- Be a leader/early adopter in your sector. Get ahead of the pack.
- Your products will be visible to your customers and prospective customers.
- CTA: Publish all your current products to the Healthcare Industry Data Lake.

Imagery: Stock image of 'health product data' AND logos of all key health jurisdictions

Medium: EDM sent to all suppliers with at least one product published on National Product Catalogue – Healthcare

When: Late May/early June by GS1 Australia. All products go live come July 1, so further activities will have limited benefit, but open to suggestions.

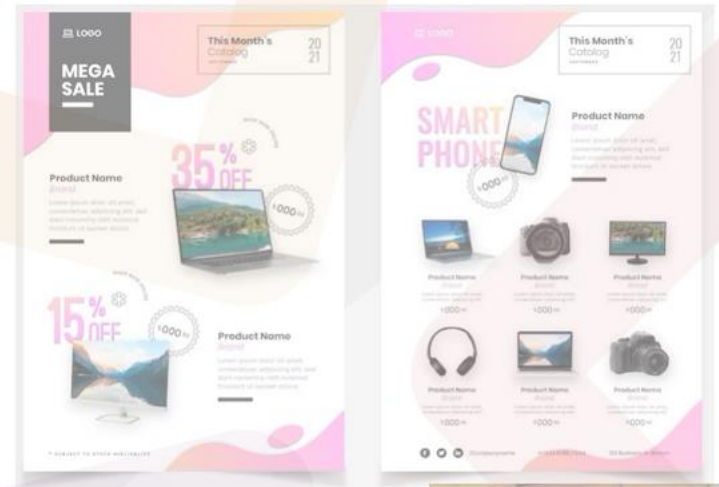


Update on a Beta Proof of Concept

AMT-CTPP and GTIN – 10 min update/demo



What are
Good **Catalogues?**



Easily accessible & relevant **Information on what is available**

NPC - Scope and Potential

NPC in Healthcare

The National Product Catalogue was implemented in healthcare to support the industry need for standardised, supplier managed data across the [whole of the healthcare](#) value chain to ensure [accuracy and efficiency](#).

<https://www.gs1au.org/for-your-industry/healthcare/npc-in-healthcare/>



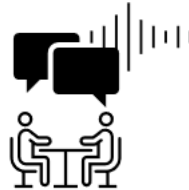
Awareness

of suppliers/distributors
and products



Opportunity

Gaps & Analytics –
alternatives, options
new markets



Engagement

Efficiency of information
exchange



Management

of contracted products and
formalised engagements

Enhanced NPC (Data-Lake + API)

Current NPC

Proof of Concept – A basic building block



Proof of Concept

Summary – Mapping data from the NPC (GTIN) and AMT-CTPP codes using the ARTGID as a common reference. Using a simple excel (vba) based query.

- Both the NPC and AMT Databases have ARTG IDs as common fields
 - Aligning NPC records and the AMT Databases by ARTGID and then pack size should theoretically result in a complete reference set of mappings
-
- ❑ **Approach taken:**
 - Link the AMT codeset of the 7 main concepts (manual import)
 - Create vba script to assist with auto population of AMT sheets using downloaded flat file as source (Confirm if AMT API with ARTG site still available to use)
 - ❑ **Completed:**
 - Successful testing of API Token authorisation using API credentials provided using connection via Excel workbook with VBA script.
 - Initial play with the Swagger site
 - Initial browse of data extract provided by Ramesh
 - Require additional pharma records in beta where the AMT CTPP code is populated

□ **Benefits**

- One of the pieces of work that Western Health requires (future) is ensuring we have an up to date medicines database (and process for ensuring it stays up to date) it contains all the relevant barcode data to ensure we can achieve a future state of barcoded medication administration (BCMA) via our EMR + automated dispensing cabinets. BCMA is very limited in Australia at the moment. Still exploratory stages

Update on a Beta Proof of Concept

Access to more product data – Want all products not just contracted lines – 10 min





Opportunities for the Healthcare Item Data Lake

- 70+ Victorian public Hospitals & Health Services and 600+ users login and look for products on HSVs Victorian Product Catalogue System (VPCS).
- HSV contracted items are matched and merged with NPC data and supplemented by non-contract data published to HSV.
- Victorian Hospitals & Health Services want more visibility and choice and HSV have been asking all suppliers to publish their entire catalogue for a long time.
- This lack of product visibility has also reduced HSVs ability to automate process in many areas including tenders, surety and distribution centre.
 - Current NPC coverage of HSV contracted and Healthcare Items is well below the expected level for any significant process automation
- Access to the HIDL data would:
 - Provide access to a greater number of products to:
 - enhance the current database, identification of alternatives and visibility of products that have not been directly published to HSV on the NPC.
 - improve workflow and automated process.
 - help greatly with surety work and functional equivalence choice.
- Additionally - HSV are looking to develop a process for API access to allow access to HIDL for other users and systems.

Update on a Beta Proof of Concept

Demo on ingesting data from the Lake.

Use Cases: Data Cleanse / Power Apps and New Materials
– 10 min update/demo

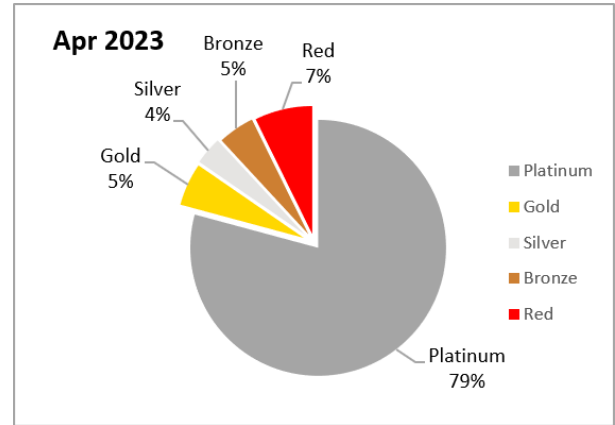
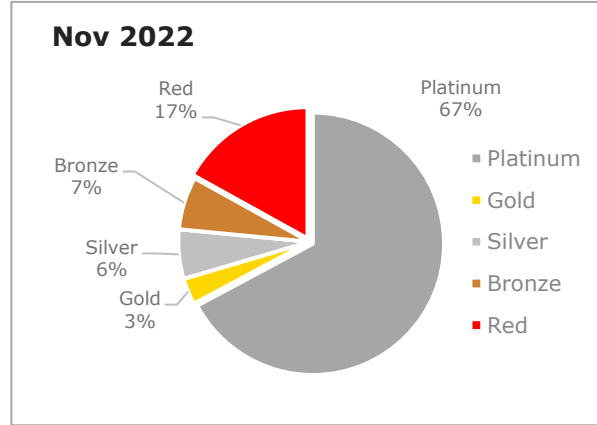
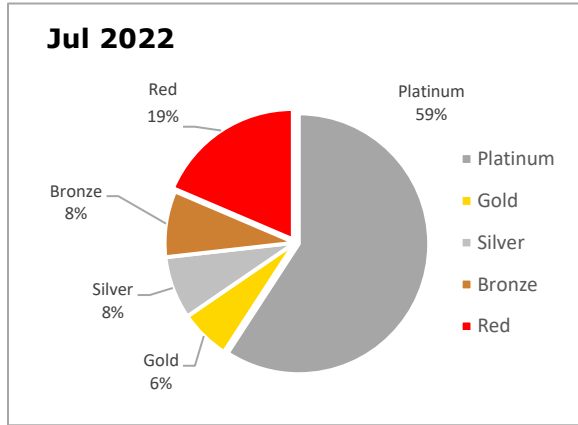


Healthcare Reimagined – Data Quality

20 min



Healthcare Data Quality Program



	Red	Bronze	Silver	Gold	Platinum
April 2023 (Ready Suppliers)	27 – 7%	17 – 5%	13 – 4%	20 – 5%	293 – 79%
Nov 2022	78 – 17%	30 – 7%	28 – 6%	15 – 3%	309 – 67%
July 2022	86 – 19%	38 – 8%	36 – 8%	29 – 6%	274 – 59%

	Top DQ Errors
1	Missing v19.0501 UNSPSC code
2	Missing Manufacturer Name
3	Trade Item Description contains commas
4	Invalid Prostheses Rebate Code

Addressing the Top Data Quality errors



	Top DQ Errors	Count	Suppliers
1	Missing v19.0501 UNSPSC code	23,389	67
2	Missing Manufacturer Name	15205	40
3	Trade Item Description contains commas	7394	36
4	Invalid Prostheses Rebate Code	7082	16
5	Depth contains 9999, 99999, 999999	3726	21
6	Width contains 9999, 99999, 999999	3697	22
7	Height contains 9999, 99999, 999999	3673	21
8	Missing Manufacturer Internal Reference	2568	33
9	Trade Item Description = Additional Trade Item Description	2448	17
10	Brand missing from beginning of Trade Item Description	2245	27

- Responsiveness still an issue. DQ team working with suppliers with a Ready status
- A few suppliers have requested Data Maintenance for DQ errors
- All rule counts and most supplier counts continue to drop
- Continued focus on quick wins and suppliers who may drop down from a Platinum status.
- Focus on suppliers in Silver ranking and reviewing suppliers with rules that are switched off. Continue to focus on Red category

Healthcare Re-Imagined – Data Quality



Recipient side – System Improvements



- 5.6 Data Quality – removing incorrect codes (see below)
- 6.1 Recipient Side Validation
- 6.3 Adding ARTG ID and PBS code list to DQ
- 7.1 Purging '99999999' or '11111111' dimensions.

5.6 Data Quality (Removing incorrect values UNSPSC and ARTGID)

CLOSED – All data needs to be updated at source, if these values are purged any future updates coming from the supplier (source) will replace the purged field. We are hoping to rectify incorrect UNSPSC and ARTGID by using the data quality (DQ Insights).

6.1 Recipient Side Validation

The proposal was to flag erroneous data or prevent it from being sent to the recipient

CLOSED – Currently not in scope (technical restrictions) can be managed through DQ reporting.

6.3 Adding ARTG ID and PBS to DQ

Agreement is for the DQI solution to add more 3rd party validations / lists to the process.

Delivered – GS1 will release a new validation rule to the DQI tool in July checking the validity of the ARTG ID – this will not impact the scores and ranking until Sept giving suppliers the ability to correct.

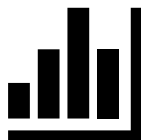
WIP – PBS and RPBS we were not successful in obtaining access to a code list. We need access to the code list to build.

7.1 Purging '99999999'...dimensions and weights

WIP – purging cannot be done as these are GDSN mandatory attributes however there are 28 suppliers identified and being managed through the DQ team. **GS1 to share list of suppliers with Healthcare Recipients for feedback and action**



Purging 9999.... Default Values



3% of products on the NPC with dimensions or weights or GPC default values

- **12** rules in Data Quality that target default values.
- **28** companies with errors
- **13K** products that need correction.
- All new products are being checked at entry into the NPC and cannot be released without correct dimensions and weights going forward.

Rule Number	Message
010-004-003	Target Market value of '999' is invalid. Please use a valid Target Market Country Code.
010-008-004	The GPC code value of '99999999' is no longer allowed for Healthcare Items. If there is no specific GPC code, please use either 10005845 for pharmaceutical or 10005844 for medical devices
030-006-006	Please provide the valid depth that applies to this item. A default product depth value of '9999', '99999' or '999999' would normally not be provided for your items but is acceptable where values are not available to enable data to be published. Data
030-006-007	A default product depth value of '9999', '99999' or '999999' must not be provided for non base items. Please provide the valid depth that applies to this item.
030-008-002	Please provide the valid height that applies to this item. A default product height value of '9999', '99999' or '999999' would normally not be provided for your items but is acceptable where values are not available to enable data to be published. Data
030-008-003	A default product height value of '9999', '99999' or '999999' must not be provided for non base items. Please provide the valid height that applies to this item.
030-010-003	Please provide the valid width that applies to this item. A default product width value of '9999', '99999' or '999999' would normally not be provided for your items but is acceptable where values are not available to enable data to be published. Data
030-010-004	A default product width value of '9999', '99999' or '999999' must not be provided for non base items. Please provide the valid width that applies to this item.
030-018-006	Please provide the valid gross weight that applies to this item. A default product gross weight value of '9999', '99999' or '999999' would normally not be provided for your items but is acceptable where values are not available to enable data to be published.
030-018-007	A default product gross weight value of '9999', '99999' or '999999' must not be provided for non base items. Please provide the valid gross weight that applies to this item.
265-007-004	Net Content has been provided as a weight; the value provided for this consumer unit GTIN exceeds 99KG (99000 GR)



UNSPSC V25

- Deployment delayed till August 2023.
- When the codes are deployed – suppliers will be able to use version 19 and version 25.
- There wont be bulk migration from one code list to the other by GS1, it will be supplier supported
- Therefore you will have some suppliers using V19 and V25.
- Comms will be planned to the supplier post deployment.
- Would like to hear from the HCNPCAG if you have any feedback



AMT-CTPP Update – March 2023

- 6,104 NPC records have a valid AMT-CTPP code
 - **1%** increase Feb to Mar
- 32 NPC records contain a deprecated code (replacement available)
- 274 NPC records contain an invalid AMT-CTPP code
- 3,777 NPC records have been identified as probable AMT-CTPP applicable records - not populated
 - * Eight more records since Feb (approximately 1/2 belong to two distributors)



Data Quality - Intro



Data Quality Review

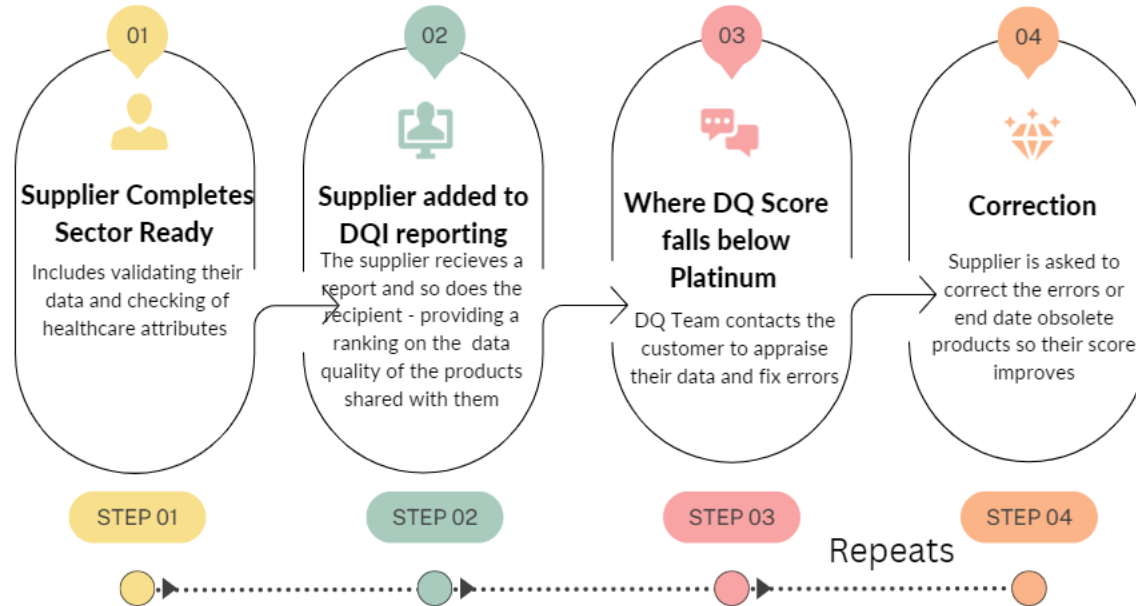


POLL →

Have you used this report before to address your data quality challenges?

- YES
- NO
- Unsure. I have not received/seen a DQ report before

Customer Journey – Data Quality



“if you move data quality upstream and embed it in the process, its much better than fixing it in all the different applications downstream”

This is what we aim to do with the service, so data shared with Healthcare Recipients is of good quality downstream

DATA QUALITY



Completeness

Standards-based

Consistency

Accuracy

Time-stamped



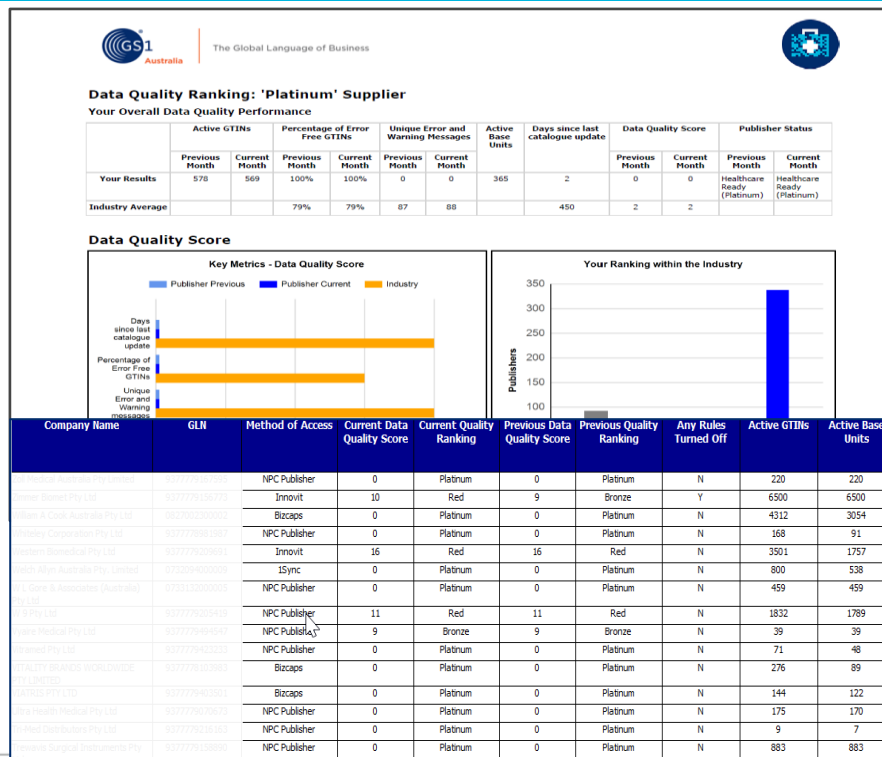
DATA QUALITY



- The Data Quality Insights tool was first developed by the Healthcare Sector to provide a sector wide review of what the data quality ranking was to suppliers and recipients **at a summary level (PDF)** as well as **detailed error reports (Excel)**.

- The DQI tool has been in use since 2016 and reports are sent monthly to suppliers and recipients alike with a view to increasing visibility and action. Data Quality is an ever-evolving topic and with new improvements in this area we want to do a review of this tool with the broader group.

To start with, let's do a short introduction to Data Quality concepts in the NPC



DATA QUALITY TOOL – (1) NPC Data Validation Rules



Rule to check on completeness of data



Conditional Rule e.g. If X, therefore Y



Check against current data where applicable e.g. code list



EXAMPLE – NPC Data Validation Rule

Prostheses Rebate Code

Prostheses Rebate Code

Prostheses Rebate Code – No.: 1 / 999

Prostheses Rebate Code

Is Trade Item Subsidized by NDSS?

Label Description

The code used by hospitals to claim back from Department of Health&Aging (DoHA) a rebate when patients are fitted with implants. This field is mandatory if the product is listed within the prostheses rebate list.

Drop down selection
of Code List

Prostheses Rebate Code must only be provided at the lowest level of the hierarchy

Error

Prostheses Rebate Code must not be provided if Healthcare Component Type C1 is `M`

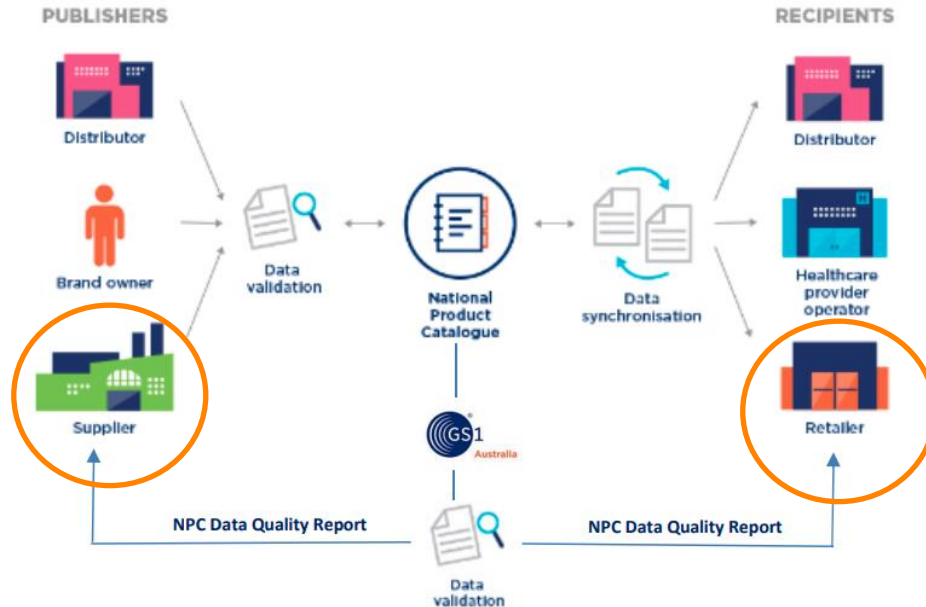
Error

Prostheses Rebate Code value supplied is not on the approved code list

Error



DATA QUALITY TOOL – (2) DQ Score / Data Quality Report



ValidationReportSupplier_937778134918.zip 18 KB
DataQualitySummaryReport_937778134918.pdf 590 KB

GS1 Australia The Global Language of Business

Your Monthly Data Quality Insights

National Product Catalogue - Healthcare

March 2023

To Chris,

Please find attached data quality reports to assist you to maintain your data to the standards required by the healthcare industry for your Device Technologies Australia Pty. Ltd. catalogue as at 14/03/2023. The quality of your catalogue data is currently Bronze. Please find attached to this email the following:

1. Data Quality Summary report (PDF)
2. Detailed Revalidation error report

The attached documents are part of the Healthcare industry's program to improve the quality of data within National Product Catalogue (NPC) and to ensure Device Technologies Australia Pty. Ltd.'s healthcare master data (catalogue) supports the increasing patient safety, and operational processes relying on this information.

Before a new NPC catalogue is granted 'NPC Ready'™ status a publisher's data must pass detailed validation. The data quality for new catalogues is generally of a very high standard however over time the overall data quality within many catalogues decreases. The quality issues can arise for a variety of reasons including not addressing initial warning errors, failing to update existing item records when industry requirements change or when updates are made to code lists or data sets.

Regular catalogue review is crucial for maintaining data quality and ensuring that the data passed to your customers for use in both clinical and non-clinical systems is a high standard.

To assist your organisation to maintain your catalogue at the data quality level expected by recipients, GS1 Australia with the assistance of the Australian Digital Health Agency and the Healthcare Industry has built a series of data quality reports that will be provided monthly and

DATA QUALITY TOOL – (2) DQ Score / Data Quality Report



Data Quality Ranking: 'Bronze' Supplier

Your Overall Data Quality Performance

	Active GTINs		Percentage of Error Free GTINs		Unique Error and Warning Messages		Active Base Units	Days since last catalogue update	Data Quality Score		Publisher Status	
	Previous Month	Current Month	Previous Month	Current Month	Previous Month	Current Month			Previous Month	Current Month	Previous Month	Current Month
Your Results	5539	5539	98%	97%	7	7	4889	98	5	8	Healthcare Ready (Silver)	Healthcare Ready (Bronze)
Industry Average			79%	79%	89	88		447	3	3		

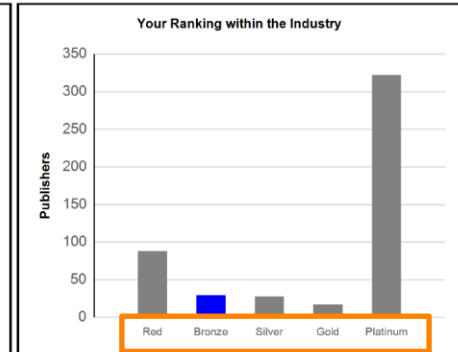
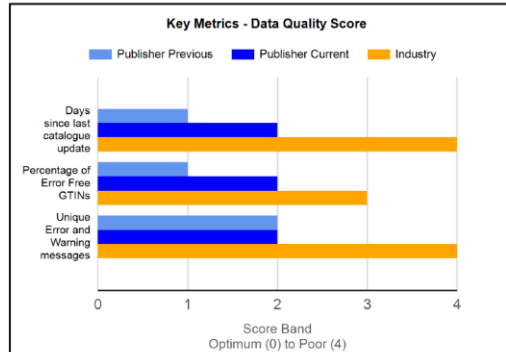
Key Metrics to measure DQ Score

Percentage of Error Free GTINs

Unique Error and Warning Messages

Days since last catalogue Update

Data Quality Score



Refer glossary for terminology



EXAMPLE – DQ Report for Data Recipient



The Global Language of Business



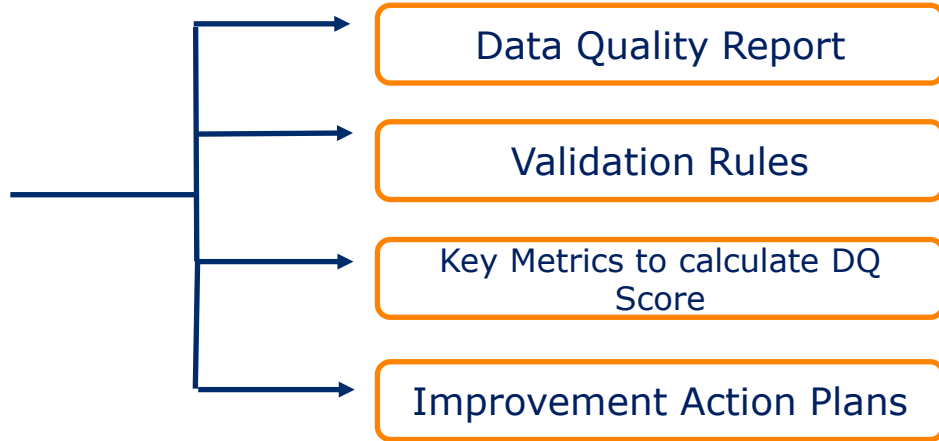
→ Data Quality Ranking: 'Platinum' Publishers

Publisher Name	Active GTINs		Percentage of Error Free GTINs		Unique Error and Warning Messages		Active Base Units	Days since last catalogue update	Number of Disabled Validation Rules	Data Quality Ranking		Publisher Status	
	Previous Month	Current Month	Previous Month	Current Month	Previous Month	Current Month				Previous Month	Current Month	Previous Month	Current Month
...	2	2	100%	100%	0	0	2	85	0	Platinum	Platinum	healthcare live	Healthcare Live
...	3583	3548	100%	100%	0	0	1764	0	0	Platinum	Platinum	healthcare ready	Healthcare Ready
...	1205	1205	100%	100%	0	0	1205	1477	0	Platinum	Platinum	healthcare loading	Healthcare Loading
...	848	848	100%	100%	0	0	721	297	0	Platinum	Platinum	healthcare ready	Healthcare Ready
...	28	28	100%	100%	0	0	12	3	0	Platinum	Platinum	healthcare ready	Healthcare Ready
...	209	220	100%	100%	0	0	155	25	0	Platinum	Platinum	healthcare ready	Healthcare Ready
...	311	311	100%	100%	0	0	311	1326	0	Platinum	Platinum	healthcare loading	Healthcare Loading





INVITATION TO DATA QUALITY FOCUS GROUP



POLL →

Would you like to be part of the **Data Quality Focus Group** to share your ideas and expertise in the industry to help shape the future of data quality in the healthcare industry?

- YES (If you select Yes, we thank you and we will be in contact with you soon)
- NO

Previous Actions



Note: Today's meeting will be recorded for the purposes of preparing minutes

Actions Log (open items)



	Action Items	Owner	Deadline	Status
1	Dolores Ternes wanting to know if dangerous goods attributes will be aligned for AU like what is published to NZ on the NPC. Would the attributes require update for AU market?	PM/STS/CE teams		
2	Long Lam (HSV) checked Will the preliminary item loading be applied to the HIDL? GS1 discussion and outcomes to be presented back to the group.	PM/STS/CE teams		
3	Stanley So (HSV) checked When the start date of the product(s) come along, is there anything mandatory that will get suppliers to populate the remaining data for the preliminary data model? What does the workflow for a supplier look like to be presented at next meeting along with how Data Quality reports will look once we add pre-liminary items to the NPC.	PM/STS/CE teams		
4	<p>Long Lam (HSV) questioned Similar to the 'Distributor only' flag, is there Sponsor flag? For example, if there is a change in who the Sponsor is over time... and/or is the validation to ensure there is only one active sponsor per product?</p> <p>This would also be important if some distributors continue providing full datasets where there are misalignments with the Sponsors info.</p> <p>GS1 discussion and outcomes to be presented back to the group.</p>	PM/STS/CE teams		
5	<p>Tendering tool: Que from Stanley (HSV), The tendering tool is for the lowest level only, if suppliers are required to enter data for packaging, would they need to access the NPC to separately to access the packaging.</p> <p>GS1 discussion and outcomes to be presented back to the group.</p>	PM/STS/CE teams		

Actions Log (open items)



	Action Items	Owner	Deadline	Status
6	<p>Long Lam (HSV) request For PBS validation:</p> <p>Query Online PBS (https://data.pbs.gov.au/data-distribution/data-distribution.html) to validate PBS codes. As potentially they store listings based on AMT TPP</p> <p>GS1 to review listing and provide feedback if suited to building validation rules</p>	Ramesh		
7.	<p>Additional Topics for next AG</p> <ul style="list-style-type: none"> • Dangerous Goods / GHS Agreement on attributes, code list agreements and how to encourage adoption from the Healthcare Sector • Updates on Healthcare Re-imagined - activities • Demo on the Tender Spreadsheet and the Data Lake along with updated stats. • Data Quality Workgroup updates and Feedback from GS1 teams on next steps • Other member topics submitted for next AG 	GS1		

Actions Log (open items)



	Action Items	Owner	Deadline	Status
4.1	GS1 seeks the suggestions from the group regarding suggestions on what else GS1 or this group can do to help drive the Data Quality improvement within NPC.	GS1/ALL	Open	Begin discussions this Advisory group with the aim to form a working group to review Data Quality in Healthcare and tools for reporting
5.3	Explore options to show a catalogue has had a full review as part of the DQI reporting (Is this an Industry wide 'Ready' status?) (refer Dataset review feedback)	Ramesh Rayer – GS1	Open	To be reviewed as part of review of DQI reports
5.4	Explore how to signify where a catalogue has been reviewed by another recipient (Is this an Industry 'Live' status?) (refer Dataset review feedback)	Ramesh Rayer – GS1	Open	To be reviewed as part of review of DQI reports
7.3	Allowing for the new dataset to be stabilize and be implemented, complete a review/assessments of what data is actually being used and HCNPCAG to then decide whether any attributes can be removed from the sector requirements.	GS1 NPC team with Recipients	Open	Data Set Review to be initialized in June 2023
8.1	New Attribute for 'Volume' raised by Ian Boyle from Queensland Health. NPC team to investigate options for automatically calculating Volume by using data already provided or option for additional attribute (if not able to the calculated).	Ramesh Rayer GS1	Closed	Feedback from QLD health that current attributes around dimensions was enough to calculate volume. Action to be closed (May 2023)
8.2	Detailed actions from 'Reimagining NPC for Healthcare' to be reported at each meeting via project summary update and reporting on specific items. Individual owners of deliverables will report where needed on progress.	Deb Prince GS1	Ongoing	Presentation included for this Advisory Group Meeting
8.3	Review of UNSPSC to ensure a. version 19 is still appropriate; b. look at how GS1 could provide more tools to support suppliers in mapping codes; and c. ensure clear communication regarding how recipients use/wish to use UNSPSC classification to support their processes (supply chain surety, catalogue groupings etc..)	Ramesh Rayer	Open	Sub-working group has been formed to discuss. Proposal from meeting provided in pre-reads and topic included for discussion in agenda August 3rd meeting

Actions Log (open items)



Action Items	Owner	Deadline	Status
9.1	Nominations for Co-Chair are open following resignation of Elizabeth All Donohoo at the ADHA. Contact Deb Prince for further information or to share nomination	All	Open Nomination form will be put into the chat and sent post meeting.
9.3	Distributor Model Sub Group – formed to review and develop proposal for any changes to the data model to better support the sponsor versus distributor ownership of data	Murray Robb	Closed Sub-group recommendations have been implemented in the technical solution delivery. Next discussion to be had more broadly is on the rollout
9.4	Interim Load Sub Group – formed to review and develop proposal for any changes to the data model to enable a potential interim and full product record	Murray Robb	Closed Sub-group recommendations have been implemented in the technical solution delivery. Next discussion to be had more broadly is on the rollout
9.5	API Interest Group – formed to discuss the application of API as part of enabling greater access to NPC data and therefore improved/wider use.	Keith Lai/Justin Middleton	Closed Recommendations received and applied to technical solution – presentation by Keith this Subgroup
9.6	Tendering Process Sub Group – formed to review and develop proposal for how to get greater utilization of data from the NPC within the tendering process. Addressing the need to recreate data in different formats, adding more value to the NPC data for suppliers and removing the inconsistency of data where the tendering data is totally different to product master data in the NPC.	Keith Lai	Closed Sub-group recommendations have been implemented in the technical solution delivery. Next discussion to be had more broadly is on the rollout
9.7	Supplier forum to be set up to allow for discussion of issues specific to Suppliers providing data within the NPC. Agreed to be set up once the Data lake is launched	Deb Prince	Open Supplier Forums to be part of rollout activity with Healthcare Recipient support
9.8	Clearer communication on recipient use of data. Exploration to be undertaken to share more information around how recipients are using the NPC data (overall and specific attributes) in order to help ensure understanding within the supplier community.	Deb Prince	Open Supplier Forums to be part of rollout activity with Healthcare Recipient support
10.1	GS1 to investigation of Data Quality Reports and actions to drive improvement – specific issues raise regarding Prosthesis Rebate Codes and their being out of date	Deb Prince	Open Data Quality to be addressed this HCNPCAG

Statistics

NPC Healthcare & Data Quality Statistics



GDSN Statistics – April 2023



70,168 GLN/entities involved

incl manufacturers/suppliers, recipients (health organisations, GPO, distributors etc.), government agencies etc..

* Increase by **1,762** (2.6%) since Nov 2022

44 Active GDSN Datapools working in healthcare

Australia's NPC is 3rd largest globally

* No Change

252 Countries (Target Markets)

5,575,830 Product Records

- 4,675,427 MedTech +8.1%
- 88,598 Pharma +3.8%
- 811,805 Other +2.7%

* **7.2%** increase since Nov 2022

<https://www.gs1.org/services/gdsn/statistics>

NPC HC Statistics – AU (April 2023)



671 Publishers/Suppliers

5 Certified Product Providers

* no change since July 2022

23 Recipients

- 7 state health departments
- 4 private hospital groups
- 11 distributors
- ADHA

* no change since July 2022

468,622 Product Records

- 440,073 MedTech
- 34,325 Pharma & Other



Meeting close