Good morning!

I am Oliver Pesch. I work for EBSCO as a product strategist and have been involved in COUNTER since the beginning. I current serve as chair of the COUNTER board and I was chair of the technical working group that created Release 5.

Today, I am speaking to you with my COUNTER hat on and we will be talking about usage statistics in general with a focus on what is new with COUNTER Release 5.

[Note: if presenting this PPT and using speaker notes, the bullets in the notes typically correspond to mouse-clicks in the animations]
Here is a quick look at what we will cover, starting with a very brief history of COUNTER, before talking through a few scenarios where usage statistics are helpful — discussing the what and the why; and, how COUNTER R5 supports these scenarios.

As we go through we will also take a few detours to look at some of the “challenges” with COUNTER Release 4 metrics and how Release 5 addresses those challenges. We will talk about SUSHI (standardized usage harvesting initiative) and, time permitting, we will review some of the other features and attributes of this latest COUNTER code of practice — if we don’t get to these today, the slides will be available for later viewing for anyone interested.
This quote from the COUNTER web site nicely sums up what COUNTER is all about. COUNTER allows librarians to demonstrate the value of online resources in a consistent and credible way with results that are comparable across information providers.
Here is a quick timeline... with key dates highlighted.

- **2002** was the inaugural meeting of COUNTER where the community came together looking for a solution to a growing problem of getting usage data for online information. The first code of practice came out a year later and has gone through several revisions.
- **2007** marked the release of SUSHI as an international standard. SUSHI automates the harvesting of usage data.
- **Release 4**, the one librarians are most familiar with, became a reality in 2013.
- **Summer of 2017** is when Release 5 was published allowing content providers 18 months to implement.
- **Before it became our reality in January of this year.**

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**COUNTER Timeline**

- **Concept** (2002)
  - Initial meeting
- **Journals & Databases**
  - Release 2 (2005)
- **Books**
  - Release 3 (2005)
- **Journals & Databases**
  - Release 3 (2008)
- **Journals, Database & Books**
  - Release 4 (2013)
- **SUSHI**
  - Release as Z39.92
  - Revised Z39.93 - 2012
- **Release 5**
  - Published (July 2017)
  - Official Release (January 2019)

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**Release 5**

**Release 5**

- Published (July 2017)
- Official Release (January 2019)
A few things to note...

- COUNTER has gone through three releases of the “Journals and Databases” code of practice between 2003 and 2008.
- ...and, in a separate books code of practice was published 2005.
- It wasn’t until release 4 that these two codes of practices were merged... They were merged but not exactly integrated; resulting in some anomalies between book and journal usage reporting.
- With Release 5, we sought to create a truly unified code of practice that handles all content types.
Scenarios
A&I Database Renewal Decision

The objective
Support a decision to renew or cancel a subscription to an abstract & index database

How?
Use metrics that effectively demonstrate overall use

What Metrics?
Searches; Records viewed

In this first scenario we are looking for metrics that will support a renewal decision for an abstract and index database like EconLit or SocIndex.

• The how is, of course, to pull metrics that demonstrate overall use so we can gauge the relative value of the database

• But what metrics?
  • The typical ones are searches (the more a database is searched the more it can be seen as useful) and record viewed.
A&I Database Renewal Decision

Support a decision to renew or cancel a subscription to an abstract or index database. The objective is to use metrics that effectively demonstrate overall use. How? Search, Results view.

What Metrics?
Searches; Records viewed

COUNTER R4
- Regular Searches
- Result Clicks
- Record Views

COUNTER R5
- Searches_REGULAR
- Total_Item_Investigations

Let's look at COUNTER metrics we have for this. On the left we have the COUNTER Release 4 metrics of “regular searches” along with “result clicks” and “record views” (more about those in a minute) and on the right we see that Release 5 offers a similar search metric plus a combined metric called “Total_Item_Investigations” which essentially combines the concepts of results clicks and record views into a single metric and helps address potential over or under counting.
A&I Database Renewal Decision Support

The objective is to use metrics that effectively demonstrate overall use.

**How?**

- **Searches**; **Records viewed**

**What Metrics?**

- **COUNTER R4**
  - Regular Searches
  - Result Clicks
  - Record Views
- **COUNTER R5**
  - Searches:Regular
  - Total_Item_Investigations

Let's take a short detour and talk about search metrics and why they may not be as reliable or comparable as they once were.

- In this example we have a researcher conducting a search on a discovery service. If you look closely you can see the different databases results are from.
- If we look at the database “facet” we get a clearer picture of the number of databases involved.
- We have a single search being performed, but we have dozens of databases each counting that search.

In a situation like this, the fact that a database was searched doesn’t really mean much because it is ALWAYS searched. We need a different way to measure if information from the database was used.
A&I Database Renewal Decision

What Metrics?
Searches; Records viewed

COUNTER R4
- Regular Searches
- Result Clicks
- Record Views

COUNTER R5
- Searches_Regular
- Total_Item_Investigations

Speaking of another way to measure if a database was used, it is time for another detour to talk about the challenges of result clicks and record views. This is something some of you may be very familiar with. When TexShare member libraries changed from or to a federated search, these metrics could change drastically. Let’s take a look.
• Our first user path is a typical one where the user performs the search on the database provider’s site and views the detailed record.
  • We get +1 for result clicks (activity that happened on the result list), and +1 for record views because we looked at the detailed record.
• Now let’s take another common workflow where a search is performed, but instead of viewing the detailed record, the researcher links direct to the full text— or to a link resolver
  • +1 for the result clicks but nothing for the record views.
• And now for the final scenario where the user found the result somewhere else—it could have been a saved link, or a federated search like MetaLib. The user directly accesses the detailed record with out conducting a search or seeing a result list
  • We have +1 for record views and zero for result clicks

This highlights the potential for under-counting if only one metric is used or over-counting if you add them up.
Full Text Database Renewal Decision

The objective
Support a decision to renew or cancel a subscription to a full text database

How?
Use metrics that effectively demonstrate overall use

What Metrics?
Searches; Articles Read; Records viewed

OK, moving on to our next scenario – the renewal of a aggregated full text databases, such as Academic Search Complete or PsycArticles.

Again, we need metrics to demonstrate value
• What metrics?
  • Searches seem an obvious choice, articles read would be a great measure, and of course records viewed since most full text databases also have some A&I
Full Text Database Renewal Decision

COUNTER R4 has the familiar metrics.... And notice that there is no full text metric in COUNTER R4 database reports; however, we have a new measure with R5 – Total_Item_Requests which is measures full text activity.

Since we have been talking about “investigations” and “requests”; lets take a quick detour to explain these new concepts.
The concept is fairly simple. Any user action related to *viewing a content item*, or *viewing metadata* or *accessing other information/services related to that item* is an “investigation.”

Actually *retrieving the item*, whether it is full text, video, audio, etc. is a “request”.

Gone are the format-specific metrics of Release 4 where we measured PDF and HTML separately (but didn’t measure certain other formats)...

Simply put... investigations are about “investigating the item” (and that includes accessing the item itself) and “requests” are about actually consuming the item.
Usage Statistics For Funding Bodies

The objective
Demonstrate value of services to government and other funding bodies to support continued or increased funding

How?
Use metrics that show how much the library and its collection are being used

What Metrics?
Searches; Books Read; Articles Read

OK, so let's look at another scenario where you are charged with pulling numbers for the annual report that make the library look good.

• What metrics might we use?
  • Searches, books read, articles read.
Usage Statistics For Funding Bodies

What Metrics?
Searches; Books Read; Articles Read

In Release 4 we can pull searches and full text counts from a variety of reports. With Release 5 searches and total item requests pulled from the platform reports, greatly simplifying the gather of statistics.
Journal Renewal Decision

The objective
Support a decision to renew or cancel a subscription to journal or journal package

How?
Use metrics that effectively demonstrate overall use

What Metrics?
Articles read

Journal renewal decision...
• What metric?
  • Articles read
Journal Renewal Decision

**What Metrics?**

- **Articles read**

**COUNTER R4**

- Full Text Requests

**COUNTER R5**

- Total_Item_Requests

In Release 4 we had the metric of full text requests. In Release 5, **Total_Item_Requests** provides the equivalent measure.
Now here is a tricky one... measuring the effectiveness of an eBook platform – or comparing two eBook platforms.

- Most likely metrics?
  - Books read... or maybe chapters read... it will depend on the platform.
eBook Platform Decision

What Metrics?
Books read; Chapters read

Release 4 had two different reports, and which one was provided depended on how the platform delivered the book content (e.g. as a whole book in a single PDF; or, by individual chapter). In release 5 we now have Unique_Title_Requests which offers a comparable metric, regardless as to how the content is delivered.
eBook Platform Metrics
Two platforms, same metric, different meaning

Release 5

Let's take another quick detour.

- On the left, we have an eBook platform that delivers the entire book as a single PDF.
- On the right, we have the same book with its 17 chapters being delivered by chapter.
- Assuming the book was retrieved in its entirety, in R4 the platform on the left was have 1 added to the count in Book Report 1; whereas, the platform on the right would increase the count by 17! With R5 each platform adds 1 to the Unique_Title_Requests metric—a given title can only get credit for one “unique title request” in any given user-session.
So with Release 5, we have a comparable metric for books read, regardless of how the platform is structured.
OK, enough scenarios for now. Let's talk a minute about automating the retrieval of
SUSHI also underwent a facelift with Release 5. With release 4, SUSHI was a somewhat heavy-weight XML-based SOAP service (simple object access protocol) which was not all that easy to code for.

With release 5, SUSHI transitioned to a more current REST approach that returns JavaScript Object Notation (JSON) — a more modern approach that most web developers are familiar with.

Let’s take a look.
This is what a SUSHI request looks like... You can paste it into a browser and get a result. Let’s dissect:

- The base URL is what the provider sets
- Then next bit is the report
- Then we identify the customer
- And the date range

The “Requestor_ID” is a security feature; and/or, an “API_Key” might also be required – all information you can get from your content provider.
And this is what you get back. It isn’t an Excel file, but if you look closely, it is readable and easy enough for a developer to load into a system or even into a spreadsheet.
There is more to COUNTER than can be covered in 30 minutes but hopefully this gives you a flavor of what Release 5 brings us.

Note that if you want a copy of this presentation, just send a note to me or Danielle and we will be happy to send a copy. It will include some bonus material that we didn’t have time to cover today – some exciting bed-time reading.

Questions?
More on R5
Features
Release 5 simplified the reporting considerably by defining only for basic reports for Titles, Databases, Platforms and Items as “Master Reports”. Master Reports are configurable and provide a lot of flexibility. But for consistency and comparability, R5 defines a set of “Standard Views” which amount to preset/standard filters and attribute selections for the master reports.
If you ever had an opportunity to do much with COUNTER Release 4 reports, you will have noticed inconsistencies in report format and even how metrics appear. The result was a lot more work is required to automate loading of R4 reports because every report is just a bit different. With Release 5 we strove for clarity and consistency.
Clarity and Consistency in Reports

The header is always structured the same, no matter what report. The labels in column A are always identical.
Clarity and Consistency in Reports

And in the body of the report, the labels in the Excel version are the same as the element names in JSON. Column order is always the same and while different reports have different columns; whenever, the same element is included, it is always called the same thing.
Clarity and Consistency in Reports

Unlike with R4 where numbers just appeared in columns and you needed to know what the report is to understand what was being counted, with R5 the Metric_Type element is always included. And the Excel and JSON versions use the exact same metric type names.
New Attributes Allows More Focused Reports

| Access_Type | Total_requests | Unique_item_requests | Unique_item_views | Total_item_views | Total_item_downloads | Total_item_prints | Total_item_scans | Total_item_requests | Total_unique_item_requests | Total_unique_item_views | Total_unique_item_downloads | Total_unique_item_prints | Total_unique_item_scans | Total_unique_item_requests | Total_requests | Unique_item_requests | Unique_item_views | Total_item_views | Total_item_downloads | Total_item_prints | Total_item_scans | Total_item_requests | Total_unique_item_requests | Total_unique_item_views | Total_unique_item_downloads | Total_unique_item_prints | Total_unique_item_scans | Total_unique_item_requests |
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| Controlled  |                |                     |                   |                  |                  |                   |                 |                 |                   |                       |                       |                       |                       |                       |                       |                       |                 |                   |                 |                  |                  |                 |                 |                 |                       |                       |                       |                       |                       |                       |                       |                       |
| Controlled  |                |                     |                   |                  |                  |                   |                 |                 |                   |                       |                       |                       |                       |                       |                       |                       |                 |                   |                 |                  |                  |                 |                 |                 |                       |                       |                       |                       |                       |                       |                       |                       |
| Gold        |                |                     |                   |                  |                  |                   |                 |                 |                   |                       |                       |                       |                       |                       |                       |                       |                 |                   |                 |                  |                  |                 |                 |                 |                       |                       |                       |                       |                       |                       |                       |                       |
| Gold        |                |                     |                   |                  |                  |                   |                 |                 |                   |                       |                       |                       |                       |                       |                       |                       |                 |                   |                 |                  |                  |                 |                 |                 |                       |                       |                       |                       |                       |                       |                       |                       |

Access_Type is a new attribute that was introduced to allow usage of Gold Open Access articles to be counted separately from the usage of the licensed/subscribed materials. When evaluating hybrid journals, many librarians prefer to count only the usage of articles that required a subscription – they can now easily do this.
New Attributes Allows More Focused Reports

**Data_Type**
Defines the nature of the report item usage is being reported on with values of “Book”, “Journal”, “Database”, etc.

**Access_Method**
Allows activity related to text and data mining (“TDM”) to be reported separately from “Regular” usage.

**Section_Type**
Adds clarity to usage reporting for books by defining the content unit accessed. E.g. Chapter, Book, Article, etc.

Some other new or clarified concepts.
- **Data_Type** describes the nature of the item being measured. Book, Journal, Database are just some of the DataTypes you will see.
- **Section_Type** is most useful when dealing with book usage data – the section type describes the unit of content delivered to the user. Book, Chapter, Article, Section are the most typical you will see.
- **Access_Method** was introduced to allow usage related to text and data mining (TDM) to be measured and reported without over-inflating regular usage. With text and data mining it is possible that every article from every journal is downloaded for mining – and including that activity with regular usage will drastically alter the results.
Helpful Links

- **Release 5** of the COUNTER Code of Practice
- COUNTER “Foundation Classes” (YouTube Videos)
- COUNTER Friendly Guides
- Appendix B of R5 Code of Practice discusses “Changes from Previous Releases”.
- Section 13.3 of the CoP discusses “Transitioning from R4 to R5” and presents the R4 -> R5 equivalents.