June 15, 2017

Financial Accounting Standards Board
401 Merritt 7
PO Box 5116
Norwalk, CT 06856-5116

RE: File Reference No. 2017-230

Dear Technical Director,

The XBRL US Data Quality Committee (DQC) is pleased to comment on the Financial Accounting Standards Board’s (FASB) Invitation to Comment on the Efficiency and Effectiveness Review of the GAAP Financial Reporting Taxonomy.

The DQC operates as a committee under XBRL US, which is a nonprofit, member organization representing XBRL service providers, data aggregators, analysts, investors, the accounting profession, and academia. The mission of the DQC is to improve the usability of XBRL data filed with the U.S. Securities and Exchange Commission (SEC). To accomplish this mission, the DQC develops freely available guidance and validation rules to eliminate inconsistencies and errors in XBRL data to facilitate the automated analysis of financial data.

The FASB’s Invitation to Comment requests feedback on potential improvements to the US GAAP Taxonomy (Taxonomy Content Improvements) and to processes that support GAAP Taxonomy-related activities (Process Improvements). We offer recommendations for each of the areas in our comments below.

**Taxonomy Content Improvements**

There are six areas where the FASB can improve the effectiveness and efficiency of the taxonomy related to content:

- Create a Framework to Consider Cost and Benefit of Taxonomy Changes Prior to Initiating a Change
- Align Taxonomy Changes More Closely with Changes to US GAAP
- Emphasize the Importance of and Improve the Accuracy of References
- Eliminate Multiple Ways to Tag Data and Metadata
- Work with DQC to Promote Comprehensive Guidance and Rules
- Simplify Consumption of Data
Create a Framework to Consider Cost and Benefit of Taxonomy Changes Prior to Initiating a Change

The US-GAAP taxonomy has undergone significant updates since the introduction of XBRL for US GAAP reporting. Since the original taxonomy was published in 2008 to the release of the 2017 taxonomy, the following changes were made to the US-GAAP taxonomy:

- 4,361 elements were removed
- 8,216 new elements were added
- 4,895 definition changes were made

Each change made results in time and effort for preparers to absorb, and additional costs to downstream users. Therefore, careful consideration must be given to avoid unnecessary changes (i.e., the estimated time to prepare for the change for the impacted issuers should be considered and compared to the benefit that it may provide to consumers). However, given the vast amount of changes over the years, it is very important that new changes improve usability of the taxonomy and resulting data.

In order to ensure that taxonomy changes are appropriately communicated, and that the implications (costs and benefits) of each change is carefully considered with regards to issuers and data consumers, the FASB needs a framework to evaluate the downstream cost/benefit of changes and each change should be evaluated against that framework before making it. For example, what is the downstream cost of deprecating an element and creating a new one for a change to the balance type? Costs include opportunity costs to data users of ambiguous and unusable data.

Align Taxonomy Changes More Closely with Changes to US GAAP

To be effective, the taxonomy must adhere to the requirements of US GAAP and reflect more closely any changes in ASUs. While this is a content issue, it can be addressed through a process change to integrate XBRL into the FASB standard setting process, which is covered in the Process Improvements section below.

Emphasize the Importance of and Improve the Accuracy of References

Importance of Codification References

The DQC believes that the tagging approach for element selection should be based on disclosure requirements. This approach will simplify the element selection process and ensure the consistency of how data is tagged and modeled and therefore, the comparability for data analysis purposes. Currently, references are defined in the EDGAR Filer Manual as the last characteristic to consider when selecting an element; however, we believe that FASB codification references should be the first factor considered because the codification provides the requirement for reported disclosures. Raising the importance of codification references in element selection should be made a high priority and the FASB should work with the SEC to revise this guidance.
Accuracy and Completeness of References

Given the importance of Codification References in element selection, the FASB should work to improve the accuracy and completeness of authoritative references in the US-GAAP taxonomy.

A filer should be able to use the paragraph reference in the codification to identify the elements that could be used to tag a specific disclosure requirement. XBRL elements should be aligned with the specific paragraph or sentence in the Codification to which they are referenced.

A user should be able to understand the disclosure requirement associated with an element in the taxonomy by tracing back to the Codification. Elements associated with multiple Codification references should be evaluated to determine that all of the Codification references are appropriate.

Eliminate Multiple Ways to Tag Data and Metadata

The taxonomy allows for multiple options for tagging data, which causes inconsistent tagging across issuers and results in manual processing for users of the data. We recommend that the FASB reduce the level of flexibility in the taxonomy that provides these multiple methods such as, the ability to use both line item elements and dimensions and the existence of multiple tags that represent very similar types of data. For high-level elements that represent requirements under Regulation S-X, such as revenue, broader elements should be used rather than very specific elements. The SEC Edgar Filer Manual currently guides issuers to use the most specific element; the FASB should work with the SEC to revise this guidance. This would improve the ability to compare the data.

The taxonomy includes many duplicative axes and dimensions, which result in filers tagging similar disclosures in different ways. For example, Additional Paid in Capital can be represented using four different methods:

1. Additional Paid in Capital line item
2. Shareholders Equity line item with the Additional Paid in Capital member
3. Shareholders Equity including Noncontrolling Interest line item with the Additional Paid in Capital member
4. Additional Paid in Capital line item with the Additional Paid in Capital member

The FASB should avoid creating new axes representing a breakdown of accounting concepts. For example, if a member on a dimension can have a balance type, then generally, it should be defined as a line item rather than as a member.

Additionally, the same concept may be tagged with different elements within a filing because line items are used on the face financial statements and dimensions are used for the footnote disclosures. One way to eliminate multiple ways to tag a concept would be to facilitate proper dimension use on the face financial statements. However, we recommend the FASB issue comprehensive guidance that limits use of dimensions on the face financial statements to situations where all of the following exist:

- Well-behaved\(^1\) dimensions

\(^1\) A well-behaved dimension is one in which the dimension members on the axis represent the complete population and the values of the members can be added to get to the total of the line item.
• Disaggregation of existing line items where extensions would need to be added
• Equivalent dimension/member combinations that are already defined in the footnotes (i.e., If dimensions are used to tag categories (breakdowns) of data in the footnotes and those categories also appear in the face financial statements, the same dimensions should be used on the face financial statements.)

The following excerpt from a statement of cash flow in the SEC’s database demonstrates a situation when it would be appropriate to define a dimension on the statement of cash flow instead of creating extension line items. Because dimension members would need to be set up to tag the various loans in the debt footnote, the same dimensions should be used to tag the data in the statement of cash flow as shown below (e.g., Term B-3 Loans, Term B-2 Loans). This eliminates the need to create extensions for each line item for proceeds and payments from long term debt.

<table>
<thead>
<tr>
<th>FINANCING ACTIVITIES</th>
</tr>
</thead>
<tbody>
<tr>
<td>Proceeds from long term debt—ABL Line of Credit</td>
</tr>
<tr>
<td>Principal payments on long term debt—ABL Line of Credit</td>
</tr>
<tr>
<td>Proceeds from long term debt—Term B-4 Loans</td>
</tr>
<tr>
<td>Proceeds from long term debt—Term B-3 Loans</td>
</tr>
<tr>
<td>Principal payments on long term debt—Term B-3 Loans</td>
</tr>
<tr>
<td>Principal payments on long term debt—Term B-2 Loans</td>
</tr>
<tr>
<td>Principal payments on long term debt—Holdco Notes</td>
</tr>
<tr>
<td>Principal payments on long term debt—Senior Notes</td>
</tr>
<tr>
<td>Purchase of treasury shares</td>
</tr>
<tr>
<td>Proceeds from stock option exercises</td>
</tr>
<tr>
<td>Excess tax benefit from stock based compensation</td>
</tr>
<tr>
<td>Deferred financing costs</td>
</tr>
<tr>
<td>Other financing activities</td>
</tr>
<tr>
<td>Net cash used in financing activities</td>
</tr>
</tbody>
</table>

We recommend that the FASB conduct a comprehensive review of the use of dimensions in the taxonomy and create comprehensive guidance for filers to ensure that concepts are tagged consistently. This review and subsequent guidance should document and address the following areas:

• Use of dependent and independent (not orthogonal) dimensions
• Consistency of hierarchies used on dimensions
• Use of defaults on dimensions and consistency across related dimensions
• Identification of dimensions that can and cannot be extended
• Use of members across different dimensions
• Identification of which line items can be used with dimensions and when
• Use of well-behaved dimensions on the face financial statements
• Use of duplicate dimensions in the taxonomy, including specific axes relative to broader categories of axes
Work with DQC to Promote Comprehensive Guidance and Rules

The FASB is a permanent observer on the DQC, and the staff has participated in the development and review of validation rules and guidance that the DQC has issued. It is important that the FASB continues to be engaged with the work of the DQC.

Simplify Consumption of Data

Decisions made regarding content in the taxonomy must always consider the perspective of the data user. For example, data aggregators often pull content by financial statement such as extracting balance sheet data for the Fortune 500 companies. Currently, companies define their own extended link roles, which, in many cases, is appropriate for specific footnote disclosures. However, there are standard disclosures that appear in every financial statement such as, balance sheet, cash flow statement, and income statement. Since companies define their own extended link roles using different words (e.g., the titles of the balance sheet may use “Statement Consolidation Balance Sheets” or “Balance Sheets”), identification of these financial statements is unnecessarily difficult.

As a result, data users have to create algorithms to determine which extended link roles represent a particular financial statement. Standardizing these disclosures through the use of templates that FASB publishes would significantly reduce/eliminate this issue. The current templates in the taxonomy are set up as example disclosures. We believe these templates would be better used to standardize the reporting of face financial statements. These disclosure groups would be defined as empty templates. If templates were provided for each type of statement, data aggregators and other data users could easily find the filings of interest without the need to perform a text-matching search.

Process Improvements

Areas where the FASB can improve the efficiency and effectiveness related to process:

- Integrate XBRL into Standard Setting Process
- Shift focus to Usability of Data
- Certify Each Taxonomy Release Conforms to XBRL Specifications and Standards
- Conduct Independent Reviews
- Streamline the Comment Process
- Create Test Instance Documents to Support Taxonomy Releases

Integrate XBRL into Standard Setting Process

It is important that the development process for new accounting standards consider how the data will be electronically consumed. As new accounting standards are developed, identifying how disclosure requirements are represented in both textual and XBRL format should be considered equally throughout the standards development process.
In light of today’s data-driven economy, the FASB should develop standards with the assumption that all data will be consumed using an electronic reporting framework rather than a paper-based one. Capital markets have re-defined accounting standards into electronic taxonomies for the last 20 years (e.g., Compustat, Capital IQ, Thomson Reuters, Bloomberg, Factset, SNL Financial, etc.).

To facilitate an integrated approach, the FASB should issue a draft taxonomy concurrently with each proposed ASU to obtain feedback and comments on the standard itself and the XBRL format simultaneously. In addition, illustrative disclosure examples should be included in Section 55 of each Codification Topic which include appropriate XBRL elements.

**Shift Focus to Usability of Data**

The primary focus of the taxonomy development team should be improving the quality and usability of data produced using the taxonomy. This does not mean the FASB should check filings, but rather, should produce a taxonomy that makes data produced comparable and consistent across filings and time. This means the same elements should be used over multiple time periods, and that changes in the taxonomy do not impact historical time series.

**Determination of Deprecated Items**

Elements should be deprecated only when absolutely necessary, as this change causes significant downstream work for filers and data users in terms of (re)building templates, load process and analytics. The reason to deprecate elements should not be to signal to issuers that they are using an element incorrectly. Instead, FASB should provide guidance and automated rules that help issuers understand how to tag correctly and address data quality issues.

**Expand Guidance to Include Validation Logic with the Taxonomy Release**

The FASB should consider working with the SEC to expand its current role in XBRL financial reporting. In this larger role, the FASB would continue to maintain the US GAAP taxonomy and publish taxonomy user guides. The FASB and SEC should also consider whether the FASB should publish broader XBRL reporting guidance and validation logic to constrain the use of the taxonomy to comply with published guidance.

For example, FASB should include specific XBRL validation logic as part of its existing process to release new ASUs. Publishing validation logic, such as which taxonomy elements should be used to support a new ASU and whether they should be negative or positive, forces the taxonomy developer to consider the impact of the new ASU and the data produced by the XBRL filing, on the user of the data. This also benefits other members of the supply chain, in that it:

- assists data preparers in getting the data correct, and;
- clarifies how the data should be used for data consumers.

It is not necessary to code the validation logic in a specific programming language, but defining the syntax of the validation logic would achieve the same goal. For example, disclosure “X” should only be made when conditions “Y” and “Z” exist. Or the value of element “A” must be contained within a given bound “B - D”. As this validation logic is published, the DQC can support this effort by coding it into the automated DQC rules to make it easy for issuers to adopt.
Certify Each Taxonomy Release Conforms to XBRL Specifications and Standards

Any published taxonomy should comply with recommended specifications and taxonomy guidance issued by XBRL International and XBRL US. The US GAAP Taxonomy should be certified by these bodies. Continued compliance with the recommended specifications ensures that XBRL processors that have been built in compliance with the specification can process the taxonomy to facilitate data analysis and data tagging. In addition, it ensures that the taxonomy remains compatible with taxonomies created by other standard setters.

Conduct Independent Reviews

Post-Implementation Taxonomy Review

One year after the release of taxonomy elements and guidance related to a new ASU, the FASB should have an independent post-implementation taxonomy review conducted to determine the effectiveness of the ASU change. The review should address the following:

- The number of extensions used for the updated disclosure, to assess the comprehensiveness of the taxonomy update
- The ability of users to extract reported data in a consistent manner
- The comparability of data across different disclosures
- The ability to create aggregate statistics from the updated disclosure requirements

Independent Review of Taxonomy Prior to Release

In addition to a post-implementation review, the FASB should also have an independent review conducted on the taxonomy changes concurrent with the public review. Ideally, this would be done prior to public review. The purpose of the review would be to determine whether:

- Changes to the taxonomy contain critical flaws
- Changes to the taxonomy are consistent with the overall design of the taxonomy and do not conflict with existing FASB, SEC and DQC guidance.
- All outstanding comments have been appropriately addressed.
- The changes comply with the cost benefit framework. (Defined above)

Streamline the Comment Process

The process to address comments received on the development taxonomy should be streamlined so that comments are resolved in a timely manner. In addition, a more transparent process should be implemented so commenters can review: how each comment is resolved; whether comments result in changes to the taxonomy, and explanations for comments that are not accepted.

Create Test Instance Documents to Support Taxonomy Releases

FASB should create comprehensive test instance documents corresponding to taxonomy changes to demonstrate how the taxonomy is applied to a given disclosure. The test instances
should cover all line items, axes and members that changed in the taxonomy. These instances will allow the FASB to determine if the taxonomy structure works as designed and expected. In addition, these instances can be used as illustrative examples in implementation guidance for filers and data users. These test instance documents should be rolled forward from taxonomy to taxonomy release, so that over time, a comprehensive library of test instances is created. In addition, validation rules can be applied to these examples to ensure that taxonomy modeling results in improved data quality.

The DQC believes that the recommendations provided in this letter will improve the element selection process for issuers and enable more consistent data for users. On behalf of the DQC, thank you for the opportunity to provide feedback. If you have any questions regarding the comments provided in this letter, please contact Campbell Pryde, campbell.pryde@xbrl.us.

Sincerely,

Lou Rohman  
Chair, XBRL US Data Quality Committee

Campbell Pryde  
CEO, XBRL US, Inc.