The North American Data Documentation Initiative Conference 2019

Benefits of Describing Statistical Production and Variables

April 24 to 26, 2019

Statistics Canada

Ottawa, Ontario

North American Data Documentation Initiative Conference

The North American Data Documentation Initiative Conference (NADDI) is an opportunity for those using metadata standards and those interested in learning more to come together and learn from each other. Modelled on the successful European DDI User Conference, NADDI is a two-day conference with invited and contributed presentations, and it should be of interest to both researchers and data professionals in the social sciences and other disciplines. A full day of training sessions precedes the conference.

The theme for NADDI 2019, Benefits of Describing Statistical Production and Variables, emphasizes the benefits of using metadata to drive efficiencies in a research data lifecycle and promote the subsequent re-use of end data products.

Data Documentation Initiative (DDI)

The Data Documentation Initiative (DDI) is an open metadata standard for describing data and specifying data collection activities. DDI's principal goal is making research metadata machine-actionable. The specification can document and manage different stages of data lifecycles, such as conceptualization, collection, processing, analysis, distribution, discovery, repurposing and archiving.

Host site location

The host site of this year's conference is Statistics Canada, Canada's national statistical office. The agency ensures Canadians have the key information on Canada's economy, society and environment that they require to function effectively as citizens and decision makers.

Wednesday, April 24, 2019
Workshops—Jean Talon Conference Room

8:00 a.m. to 9:00 a.m.   **Coffee and breakfast**

9:00 a.m. to 12:00 p.m.   **Workshop 1**
Workshop chair: Stéphane Crête, Statistics Canada

Introduction to DDI
Instructor: Jane Fry, Carleton University

Knowing what DDI is and understanding how it works and how to use it can be quite daunting—especially if you are not a programmer or coder. DDI can be quite a powerful metadata schema for the social sciences, but understanding the basics of it is a prerequisite to learning how to use it.

This workshop will tell you about the background of DDI, the different tools used to interpret it and how it is integrated into a data lifecycle workflow. There will be exercises to help you understand the different facets of DDI, thus allowing you to see its potential and power.

This is not a technical workshop; it is intended for those with no background in DDI. However, if you want a refresher in the whys and wherefores of it, then this workshop is also for you.

12:00 p.m. to 1:00 p.m.   **Lunch**
Please note that lunch will not be provided by the host.

1:00 p.m. to 4:00 p.m.   **Workshop 2**

Document questionnaires and datasets with DDI: A hands-on introduction with Colectica
Instructors: Jeremy Iverson and Dan Smith, Colectica

This workshop offers a hands-on, practical approach to creating and documenting both surveys and datasets with DDI and Colectica. Participants will build and field a DDI-driven survey using their own questions or samples provided in the workshop. They will then ingest, annotate and publish DDI dataset descriptions using the collected survey data.

Attendees have the option of bringing their own Windows laptops to participate in the hands-on exercises.

6:00 p.m. to 8:00 p.m.   **Informal gathering**

Johnny Farina Restaurant
216 Elgin St., Ottawa, ON K2P 1L6

Thursday, April 25, 2019
Day 1—Jean Talon Conference Room

8:00 a.m. to 9:00 a.m.	**Registration—coffee and breakfast**

9:00 a.m. to 10:30 a.m.   **Welcome**

Statistics Canada
Kathryn Stevenson, Statistics Canada

DDI Alliance welcome and introduction of keynote speaker
Jared Lyle, Director, DDI Alliance, Inter-university Consortium for Political and Social Research (ICPSR)

Keynote: Enabling the modernization of official statistics with metadata standards
Anil Arora, Chief Statistician of Canada

Mr. Arora has led significant transformational initiatives throughout his career, with experience and partnerships spanning all three levels of government, the private sector and international organizations, including the United Nations and the Organisation for Economic Co-operation and Development. He has led projects on high-profile policy issues and legislative and regulatory reform, and has overseen large national programs. Anil Arora was appointed Chief Statistician of Canada in September 2016.

Data Analytics as a Service
Robert McLellan, Statistics Canada

10:30 a.m. to 11:00 a.m.   **Break**

11:00 a.m. to 12:20 p.m.   **Session 1**
Session chair: Dan Smith, Colectica

DDI conference evaluation demo
Barry T. Radler, University of Wisconsin–Madison

Use of DDI to document annual public-use microdata (PUMD) for Consumer Expenditure Surveys
Dan Gillman, U.S. Bureau of Labor Statistics

The U.S. Bureau of Labor Statistics (BLS) is using DDI to document Consumer Expenditure Surveys (CE). CE produces PUMD files on a yearly basis. The immediate goal in the development of the system is to allow users to connect PUMD variables to their questions. The current stand-alone database with the information on all the variables is incomplete, and the ability to track changes to

codes, definitions, variables, and files over time and across surveys is not straightforward. Our plans are to incorporate functions to view the mapping of variables and questions and track changes. In addition, we want to record methodological documentation such as questionnaires, weighting and sampling designs. In the iteration of the metadata system currently under development, we are mapping the variables from the 2017 PUMD files to their questions, which either wholly or in part provide the input to them. In this talk, we describe the development effort with particular emphasis on variable and question mapping. In many discussions about metadata models, the mapping between variables and questions is glossed over—the implication being that mapping is straightforward. Our experience is different, and we describe the difficulties faced.

Use of DDI to support data curation in Dataverse
Amber Leahey, Scholars Portal, Ontario Council of University Libraries

Dataverse is an open source data repository platform developed by the Institute for Quantitative Social Science at Harvard University (with contributors and adopters from all around the world). Dataverse supports researchers with open and mediated data publishing, sharing, research promotion, and the reuse of others' data. The Dataverse platform makes it easy to deposit and publish research data; however, often deposited research data require additional preparation and curation to be ready for meaningful reuse. Data require accurate and rich documentation and metadata—without them, data are meaningless. Standard metadata, such as DDI, are useful for describing data in Dataverse. This presentation will demonstrate how Dataverse supports the creation of metadata for improved data discovery, access and reuse, and the preservation of research data in Dataverse.

Creating DDI Lifecycle documentation for longitudinal data at ICPSR
Sanda Ionescu, Inter-university Consortium for Political and Social Research

In line with ICPSR's commitment to adopt DDI Lifecycle to document some of its longitudinal studies, we have recently embarked on a new project that involves creating DDI 3.2 metadata for one of our most popular collections at the National Social Life, Health and Aging Project (NSHAP), which is managed and distributed by our National Archive of Computerized Data on Aging (NACDA). We will briefly introduce this collection and elaborate on the steps taken to move its metadata to DDI Lifecycle using Colectica Designer and make it publicly available on the Colectica Portal. We plan to focus on any specific challenges encountered during this process and the practical solutions applied to overcome them. We also intend to showcase some of the benefits of using DDI-L, such as the improved comparability and usability of the data.

12:20 p.m. to 1:30 p.m.	**Lunch**

1:30 p.m. to 3:00 p.m.   **Session 2**
Session chair: Barry T. Radler, University of Wisconsin–Madison

Solve for X(ML): Transforming metadata to transform data access
John Huck, University of Alberta Libraries

At the University of Alberta, a subscription to data resources from the Linguistic Data Consortium (LDC) presented a cataloguing problem for library staff and access difficulties for users: resources were published in digital and physical formats, but the digital access was difficult to catalogue, and some datasets were available only in physical format. As a result, there was no single place to discover what datasets the library had purchased, and accessing the data involved a different retrieval process for each format.

This presentation describes a project undertaken by staff from three library units to develop a simplified access model for LDC resources, set to be launched in 2019. LDC metadata available from an actively updated OAI-PMH host provided the basis for a transformation workflow to generate MARC records with custom XSLT stylesheets. This allowed the team to think about user goals rather than cataloguing workflows and imagine an access model where users would not need to know anything about data format. In the new access model, each MARC record includes a link to a retrieval request form. Library staff pick the best format for retrieval and deliver the data electronically to authorized users.

metajelo + DDI: Deriving a metadata package for journals to support externally linked objects from DDI
Lars Vilhuber, Labor Dynamics Institute, Cornell University

We have proposed a metadata package (called metajelo) that is intended to provide academic journals with a lightweight means of registering the existence and availability of supplementary materials at the time of publication. Information about the supplementary materials is, in most cases, critical for the reproducibility and replicability of scholarly results. In many instances, these materials are curated by a third party that may or may not follow developing standards for the identification and description of those materials. Researchers struggle when attempting to fully comply with data documentation and provenance documentation standards.

However, many of the required elements are present in DDI, and when properly populated by data custodians using DDI, generating the metajelo package is straightforward. In this presentation, we describe the rationale behind metajelo and how archives that use DDI can easily provide researchers with a compact metadata package that enhances reproducibility while reducing researcher effort.

Complex sampling design settings: Bridging technical documentation and applied researcher software use
Stanislav Kolenikov, Abt Associates

This work documents our understanding of and best practice recommendations for specifying complex sampling design settings in the statistical software used for design-based survey data analyses. We discuss complex survey data features such as stratification, clustering, unequal probabilities of selection and calibration; outline their impact on estimation procedures; and demonstrate the dangers of incorrect analysis that ignores them. We show how statistical software handles these features. We analyze the documentation that accompanies several surveys collected and distributed by national statistical offices, statistical agencies and academic organizations, and rate the ease or difficulty of specifying the sampling design correctly in the software based on the dataset documentation provided. We conclude with our recommendations for survey data providers on how to create the transparent, accurate and effective documentation required by survey data users to account for sampling design features in their analyses of complex survey data. This work is co-authored with Brady T. West (University of Michigan) and Peter Lugtig (Utrecht University).

Using DDI and metadata in research analyses, reporting and dissemination: Use case for the development of risk prediction algorithms in health
Doug Manuel, Statistics Canada

Despite a strong imperative for open and reproducible research, DDI metadata rarely survive to research dissemination.

We describe a DDI metadata workflow for research analyses and dissemination by means of the use case of predictive algorithms using Statistics Canada's Canadian Community Health Survey (CCHS) linked to longitudinal mortality and disease registries (CCHS linked). The workflow starts with a DDI-compliant worksheet that allows investigators to collaborate across institutions to pre-specify predictive model parameters. Routine functions clean and transform the study cohort according to the worksheet specifications, adding metadata to the study cohort DDI document. DDI metadata are then reused in a range of dissemination settings, including manuscript tables and web-based algorithm visualization tools. The DDI document is then published. Models are reported using Predictive Modelling Markup Language (PMML), a complementary XML schema. Algorithms are deployed using DDI, PMML and TensorFlow scoring engines.

3:00 p.m. to 3:15 p.m.	**Break**

3:15 p.m. to 4:15 p.m.   **Session 3**
Session chair: James Doiron, University of Alberta Libraries

Development of a workflow for capturing, enhancing and disseminating longitudinal study metadata
Jon Johnson, UK Data Archive

CLOSER brings together eight world-leading UK longitudinal studies to maximize their use, value and impact. A major output has been CLOSER Discovery, which allows users to search and browse questionnaire and dataset metadata. The efficient data management of complex longitudinal studies is both desirable and increasingly essential. Metadata standards are critical for maintaining this information through the data lifecycle. Many long-term studies face a historical backlog that has prevented them from moving to the best metadata standards. The CLOSER project has received significant funding from the Economic and Social Research Council and Medical Research Council for these eight studies, which provide the basis for a sustainable high-quality research resource.

CLOSER has developed a suite of tools and software using both in-house and commercially available solutions that begin to tackle some of the obstacles involved in documenting and using longitudinal metadata. The presentation will report on the successes and problems faced in using the DDI Lifecycle metadata standard to achieve these ambitions. This will be delivered as three presentations on:

- questionnaire metadata capture and annotation (Charles De Barros, CLOSER)
- the mapping of questions, variables, keywords and concepts (Charles De Barros, CLOSER)
- a demonstration of the latest functionality available for the research community (Jon Johnson, CLOSER).

Using DDI to document a complex longitudinal study
Barry T. Radler, University of Wisconsin–Madison

Comprehensive research metadata greatly clarify the methods and processes used to capture data and produce datasets. In so doing, they provide data users the information needed to better analyze, interpret, preserve and share them. Richly structured metadata are even more critical with complex longitudinal studies that contain thousands of variables, different data types and many waves of data collection. Midlife in the United States (MIDUS) is a national longitudinal study of approximately 12,000 Americans that examines aging as an integrated bio-psychosocial process. MIDUS has a broad and unique blend of survey, experimental and laboratory research data collected over 20 years through a variety of modes. For the last decade, MIDUS has increasingly relied on the DDI to manage these complex research data and make their metadata machine-actionable in a user-friendly format. More recently, MIDUS has used Colectica tools to improve its DDI infrastructure and create a DDI-based harmonized data extraction system. Such a system allows researchers to search across datasets for variables of interest,

identify and harmonize related longitudinal versions of variables, and easily create customized data exports.

4:15 p.m. to 4:45 p.m.	**Session 4** Session chair: James Doiron, University of Alberta Libraries **DDI community engagement: Discussion and feedback** William Block, Cornell Institute for Social and Economic Research, Cornell University Barry T. Radler, University of Wisconsin–Madison Jared Lyle, Director, DDI Alliance, Inter-university Consortium for Political and Social Research
4:45 p.m. to 5:00 p.m.	**Wrap-up** James Doiron, University of Alberta Libraries
7:00 p.m. to 9:00 p.m.	**Banquet** The Bier Markt Ottawa 156 Sparks Street, Ottawa, ON K1P 5C1

Friday, April 26, 2019
Day 2—Jean Talon Conference Room

8:00 a.m. to 9:00 a.m.	**Coffee and breakfast**

8:30 a.m. to 9:30 a.m.   **Poster session**
Session chair: Flavio Rizzolo, Statistics Canada

Dataverse North Metadata Best Practices Guide
Amber Leahey, Alexandra Cooper, Martine Gagnon, et al.

One of the benefits of using Dataverse is that it provides an expansive set of metadata for describing research data at the project and dataset levels. Using a combination of Dublin Core and the DDI standard at its core, Dataverse provides a metadata set that is well-suited to the social, behavioural, economic and health sciences. However, not all researchers may know which metadata fields to use or how best to interpret them. This poster will showcase the Dataverse North Metadata Best Practices Guide—a primer for novice to intermediate users of the Dataverse data repository platform that provides direction on how to describe research datasets using the standard metadata fields in Dataverse.

A practical look at the DDI 4 methodology pattern
Dan Gillman, U.S. Bureau of Labor Statistics

The methodology pattern in DDI 4 is a general structure designed to account for descriptions of study methodology at any level of detail. The pattern accounts for two independent considerations: (1) it separates the design (the what), the algorithm (the how, in theory) and the process (the how, in practice); and (2) it allows for a recursive description into more detailed sections of the processing cascade. Separating the design, algorithm and process supports reuse and provides a rich descriptive range. For instance, the difference between an algorithm with an unspecified stopping criterion and a process with a specific bound provided is clearly differentiated. Furthermore, a design is clearly differentiated from the algorithm. Many algorithms can satisfy the same basic design. Using the example of the U.S. Consumer Expenditure Surveys (CE), we illustrate this multi-layered approach. CE accomplishes its processing through four discrete phases or sub-systems. Each can be generally described at a high level, at a mid-level by generally describing each sub-process, and at a low level by providing step-by-step details of each sub-process. We also illustrate why the lowest level descriptions might violate confidentiality requirements.

Keeping metadata alive during health research analyses and reporting: Using an open science imperative to update the current metadata-sparse analysis approach
Doug Manuel, Statistics Canada

Mapping DDI 2 to DDI 4

Larry Hoyle, Institute for Policy and Social Research, University of Kansas
Joachim Wackerow, GESIS, Leibniz Institute for the Social Sciences

This poster describes the effort to add a DDI-Codebook (DDI-C) import function into the DDI 4 R package.

The DDI 4 Codebook Group did a lot of the modelling of one section of DDI 4 using a spreadsheet that mapped DDI-C elements into DDI 4 properties. This started with a list of elements used by the Consortium of European Social Science Data Archives (CESSDA) and was refined at the Norway Sprint in Knutholmen in May 2016. Unfortunately, these mappings were not always at the leaf-node level.

An R program also imported DDI-C XML from the European Social Survey and generated a list of unique XPaths of leaf elements used in that set of metadata. These elements, along with corresponding DDI 4 leaf paths, were used to update the spreadsheet.

This spreadsheet has been further refined to create an actionable table mapping DDI-C leaf values to leaf properties in DDI 4. Writing code to import the DDI-C required the following additional information:

- the mapping of DDI-C sub-paths to DDI 4 identifiable classes (e.g., all of the information for one DDI-C var map to one DDI 4 identifiable variable)
- the mapping of abstract target classes to specific extensions
- additional semantic property values, such as type of methodology.

Importing DDI-C into a lifecycle-level version of DDI (e.g., DDI 4) also involves identifying repeated metadata, such as reused value domains (e.g., reused Likert-style code lists) that are repeated for multiple variables. An R function served to do this sort of matching using the R "all.equal" function, excluding differences in agency, ID and version.

The CESSDA Vocabulary Service: A new state-of-the-art tool for creating and publishing controlled term lists

Sanda Ionescu, Inter-university Consortium for Political and Social Research
Taina Jaaskelainen, Finnish Social Science Data Archive

The DDI Alliance has been creating and publishing its own controlled vocabularies since 2005. These are targeted for specific DDI classes, but are external to DDI and may be used with other metadata standards.

In its new core metadata model, CESSDA recommends the use of DDI controlled vocabularies where available, as well as the creation of new lists, as needed. To support this effort, CESSDA has financed the development of a state-of-the-art tool that facilitates the creation, translation and publication of controlled vocabularies and automates a significant part of the process. The tool is now in its final testing phase and is scheduled to go live this spring.

Our poster will introduce this new web-based tool in the context of our ongoing controlled vocabularies work and will highlight some of its most prominent features, such as cross-vocabulary searches, group sharing and editing, support for multiple language translations, automated versioning, one-click publishing, and multi-format downloads.

Leveraging language codes in a stylesheet transformation: Open Language Archives Community (OLAC) (ISO 639-3) into MARC
John Huck, University of Alberta Libraries

Being able to generate MARC records through a stylesheet transformation was a necessary element of a recently introduced solution for the discovery of and access to a collection of linguistic data resources at University of Alberta Libraries. This poster shows how ISO 639-3 language codes in the source metadata were transformed into Library of Congress subject headings and MARC language encodings for approximately 750 records.

Crosswalk 4.0 adds DDI 3.2
Florio Arguillas Jr. and William Block, Cornell Institute for Social and Economic Research

At last year's NADDI in Washington, D.C., Crosswalk 3.0 showcased how it resurrects near-dead data—ASCII datasets with no accompanying setup files, but only hardcopy of the codebook—by simplifying the process of creating setup files and datasets just by using an Excel spreadsheet containing variable information and location and using the source ASCII dataset as inputs. Along with creating SAS, SPSS and Stata setup files and datasets, Crosswalk 3.0 also outputs the DDI 2.5 Codebook. This year we are showcasing Crosswalk 4.0, the latest version of the software, in a poster session. In addition to the features present in 3.0, we have added the ability to create R setup files, R workspaces and DDI 3.2 Lifecycle.

U.S. Census Bureau data repository
Jared Lyle, Inter-university Consortium for Political and Social Research

We will provide an overview of the U.S. Census Bureau data repository, which preserves and disseminates survey instruments, specifications, data dictionaries, codebooks and other materials provided by the U.S. Census Bureau. ICPSR, the host of this data repository, has also listed additional census-related data collections from its larger holdings. We will also highlight census-produced DDI content used in archiving collections within the repository.

9:35 a.m. to 10:45 a.m.   **Session 5**
Session chair: Amber Leahey, Scholars Portal

Implementing DDI 3.3 support in Colectica version 6
Dan Smith, Colectica

Colectica version 6 will include many new content areas of DDI Lifecycle 3.3 and will adopt many of the new features while still maintaining compatibility with all prior versions of the standard.

This talk will review the new content available in DDI 3.3 and how it is being added to Colectica version 6 in the following areas: classification management based on GSIM and Neuchâtel and Colectica's migration from Copenhagen mapping to DDI 3.3, non-survey data collection measurements being added to Colectica questionnaires, sampling and weighting, questionnaire design, support for working with DDI as a property graph with properties on items and references via both DDI 3.3 and Colectica's RDF Services for Colectica Repository, and quality statement improvements. In addition, the talk will highlight the now-complete formal model that is behind DDI 3.3 and how it has been useful for software development, as well as how Colectica approaches DDI implementation to ensure backwards compatibility.

DDI 4 in R: New possibilities
Larry Hoyle, Institute for Policy and Social Research, University of Kansas
Joachim Wackerow, GESIS, Leibniz Institute for the Social Sciences

We have been working on a representation of the DDI 4 model in R, realized as a package. We now have an R-object-oriented class for each DDI 4 class with associated functions to validate and print objects, manage a registry of DDI 4 objects, manage DDI 4 URNs, and import and export DDI 4 XML.

Our original goal was to enhance the ability of researchers to capture and report on metadata at the source, with the ability to embed references to metadata.

In this presentation, we will discuss the intriguing prospect of computing directly on the metadata. What could be done with these metadata objects to facilitate comparison and harmonization? In what ways could the metadata be visualized?

DDI 4 has powerful new capabilities in the collections pattern. For classes realizing a collection, operators could be defined to return their intersection, union and difference. Inner and outer joins could also be defined. Relationships within the collection could be visualized via network diagrams. These operators might provide efficient tools for harmonization.

Operators could also be defined on pairs of objects of the same class. Similarity measures could be computed using corresponding attributes. These could be used to create visualizations (e.g., of similarities among variables).

The Picasso Project
Office of Privacy Management and Information Coordination, Statistics Canada

Picasso is an enterprise solution for statistical data and metadata management. Automated business rules will ensure metadata are gathered uniformly, adhering to common architecture, governance and policy instruments.

Picasso replaces local solutions with a single hub for managing metadata for all surveys, administrative files and record linkage projects. It is a single point of access for all fit-for-use data files and an enterprise search and discovery engine using metadata to facilitate the reuse of information. It provides a user-friendly interface with an automated workflow and integrated lifecycle management.

Picasso puts the power and potential of information together in a single platform to promote the reuse of data and statistical metadata to support statistical production and analysis. Its well-organized registry and repository, and its user-friendly tools, are designed to support the rapid growth in data assets and the shift to an administrative data-first approach. Information management principles are embedded into the automated workflow to ensure good stewardship and make it easier for all employees to search, access, reuse, manage and report on data and statistical metadata.

Picasso aligns with reference models (e.g., GSIM and GSBPM) and will support standard vocabularies (e.g., DDI, SDMX, DCAT, SKOS/XKOS, PROV-O) in a variety of formats (e.g., JSON, XML, RDF).

10:45 a.m. to 11:00 a.m. **Break**

11:00 a.m. to 12:15 p.m. **Session 6**
Session chair: Bill Block, Cornell University

Documenting variable provenance with DDI and Colectica
Jeremy Iverson, Colectica

DDI supports documenting data with variable-level detail. Normally such information includes a variable's name, label and data type, but DDI supports the inclusion of more details (e.g., the variable's lineage). The data behind a variable may have originated from a survey, from administrative data or from some other dataset. The variable may have been copied directly from a source, or it may have been calculated using a formula or algorithm. For a researcher to properly understand and analyze the data, the lineage of each variable should be documented in as much detail as possible.

Variable-level provenance information can be recorded by data management staff manually. However, in some cases it is also possible to extract the transformations that were used to create a variable based on statistical source code. The C^{2}Metadata project, sponsored by the U.S. National Science Foundation, is building tools to

accomplish this and to record the transformations in structured ways that can be included with data documentation.

This presentation will show data documentation from real studies that are providing variable-level provenance information and will discuss the methods used to create and publish the documentation.

DDI compliance benefit for a Generic Statistical Business Process Model
Microdata Access Division, Statistics Canada

The Microdata Access Division (MAD) is responsible for providing microdata access to researchers outside Statistics Canada. It also provides support, expertise and standards of data provision to subject-matter areas within Statistics Canada.

MAD will showcase the Virtual Data Lab project and how the division would stand to benefit from a Generic Statistical Business Process Model compliant with DDI from design to dissemination.

Labour Force Survey: Improved access for researchers
Susan Mowers, University of Ottawa Libraries

The Canadian Labour Force Survey (LFS) is a monthly survey produced by Statistics Canada. It produces a number of data products used by researchers across the country. The monthly public use microdata files (PUMFs) that are distributed through the Data Liberation Initiative (DLI) in coordination with the data services provided by university libraries require accuracy and consistency of metadata in DDI format for online access. This presentation discusses the process for marking up the LFS across the different series of data files (1976 to present) in both English and French and across different metadata authorship from various institutions over the years.

12:15 p.m. to 1:30 p.m.	**Lunch**
1:30 p.m. to 2:30 p.m.	**Session 7**

Closing plenary—Introduction: James Doiron, University of Alberta Libraries
Jeff Moon, Director, Canadian Association of Research Libraries, Portage Network

2:30 p.m. to 3:00 p.m.	**Wrap-up and evaluation**

DDI conference evaluation results
Barry T. Radley, University of Wisconsin–Madison

Wrap-up
Jared Lyle, Director, DDI Alliance, Inter-university Consortium for Political and Social Research
Cory Chobanik, Statistics Canada

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