Workshop title: Careers in Biocuration: An overview of the current status, challenges and goals in the

biocuration field

Lead organizers: Nicole Vasilevsky, Cecilia Arighi, Randi Vita

Time: 2 hrs

### Objective:

We will present an overview of biocuration as a career from the perspectives of a diverse collection of biocurators, with different professional backgrounds and at different career stages. Additionally we will summarize the results collected in a publicly distributed survey on Biocuration Careers, executed in 2017. We will discuss the challenges we face and share our collective views on where we would like to see the field go in the future. This workshop will present a combination of short talks, and a panel discussion/open guided discussion.

#### Relevance:

This workshop is targeted to all conference attendees; those already in the field of biocuration as well as participants interested in learning more about the field, from all scientific and personal backgrounds and career stages.

### Proposed format (times are approximate) with confirmed speakers:

students, and newcomers as we promote our field to the wider scientific community.

- 1) **Who are we?** | Short talk by Nicole Vasilevsky | 15 minutes *Summary*: We will share our findings from the biocuration career description survey. The survey gathered information about the field of biocuration, including information about our various roles, background, skill sets, level of job satisfaction, and more. We will present a breakdown of responses and trends from you and your biocuration peers with the hopes that this information will be used to better inform scientists,
- 2) **Summary of the ISB white paper** | Short talk by Suzanna Lewis | 10 minutes *Summary:* At the 9th Biocuration Conference in 2015, a workshop brought together the perspectives of over 100 biocurators, which were synthesized into a white paper titled "Biocuration: Distilling data into knowledge." The author of this paper is the International Society for Biocuration as a whole. This talk will offer a brief overview of the paper. We envision more papers of this style in coming years to increase public awareness, and solicit suggestions on themes describing the key role biocuration plays in scientific discovery, as well as more examples on the invaluable evidence our community has collected in support of this role.
- 3) **Training opportunities and awareness** | Short talk by Monica Munoz-Torres | 15 minutes *Summary:* We are frequently asked 'What is the path into a career as a biocurator?," How can I learn more about becoming a biocurator?'. To help answer these questions the ISB Executive Committee is interested in aggregating existing biocuration training materials from around our community, and in a combined effort with the ELIXIR TeSS training portal (https://tess.elixir-europe.org/) and the Global Organisation for Bioinformatics Learning, Education & Training (GOBLET; https://www.mygoblet.org/). The goal is to make these resources available to the biocuration community, linking their availability through the ISB, TeSS and GOBLET websites. We will share details on preliminary efforts, as well as our plans to continue growing a publicly available collection of biocuration curricula. We are also seeking to collect feedback on the types and subjects of additional material our members would like to see.
- 4) **PgCert in Biocuration** | Short talk by Claire O'Donovan | 10 minutes

*Summary*: The Institute of Continuing Education at Cambridge University will be providing a year long PgCert in Biocuration starting in September/October 2018. The course will be mostly online with three f2f sessions at Madingley Hall and EMBL-EBI.

# BREAK | 20 minutes

5) **Biocuration Groups and What They Want** | Panel discussion with Randi Vita, Mike Cherry, Sandra Orchard, Saber Akhondi, and Jiao Li. Moderated by Nicole Vasilevsky and Cecilia Arighi | 50 minutes *Summary*: We propose to host a panel of leaders in biocuration from diverse backgrounds, geographic locations and affiliations to discuss two topics. First, panelists will be asked to describe what they look for when hiring a biocurator, in the context of the of the biocuration projects they have worked on (presently and/or in the past). The panelists will be asked to discuss key skills and qualifications when hiring a biocurator, as well as personality traits that make a good curator. Input and questions from the audience will be encouraged and welcomed. The goal of this sub-session will to engage the audience in an interactive discussion and to generate a generic position description that can be shared on the ISB website, and used by hiring managers and job seekers for biocuration positions. Secondly, the audience will be encouraged to ask the panelists and audience about problems we are facing as a community. Suggested discussion topics will include issues with infrastructure, funding, redundant efforts, or training. We will encourage discussion about any changes we would like to see as a community and any changes we want. The notes from this discussion will be disseminated with the community via the ISB website.

# About the organizers:

**Nicole Vasilevsky** is the lead biocurator in the Ontology Development Group at the Oregon Health & Science University Library, in Portland, Oregon, USA. She performs biocuration for the Monarch Initiative and contributes to ontology development for the Human Phenotype Ontology and Monarch Disease Ontology. Nicole is the Secretary for the International Society for Biocuration Executive Committee.

**Cecilia Arighi** is a Research Associate Professor at the University of Delaware, USA and an Adjunct Assistant Professor at Georgetown University Medical Center (GUMC). Ceci leads the curation group and text mining efforts at PIR/UniProt, leads curation efforts for the Protein Ontology and works on the BioCreative efforts. Ceci is the Chair of the International Society for Biocuration Executive Committee.

Randi Vita is Lead Ontology and Quality Manager at the La Jolla Institute for Allergy and Immunology in San Diego, California, USA. Randi leads a curation team of 7 biocurators for The Immune Epitope Database and Analysis Project (IEDB), where she has worked for the past 12 years. Additionally, Randi integrates formal ontologies into the IEDB as well as into external projects such as The Human Immunology Project Consortium (HIPC) program.

# Speakers:

Suzanna Lewis, Lawrence Berkeley National Laboratory, Berkeley, CA
Monica Munoz-Torres, Phoenix Bioinformatics Corporation, Redwood City, CA
Claire O'Donovan, European Bioinformatics Institute, Cambridge, UK
Mike Cherry, Stanford University, Stanford, CA
Sandra Orchard, European Bioinformatics Institute
Saber Akhondi, Elsevier, Amsterdam, NL
Jiao Li, Chinese Academy of Medical Sciences, Beijing, China