

# GEOCODE



# GLOBAL EDUCATION ORGANIZATION CODE



## GEO CODE

A FREE, OPEN AND STANDARDIZED

**ONLINE DIRECTORY OF CODES & IDENTIFIERS  
OF EDUCATION ORGANIZATIONS**

FOR USE BY

**EDUCATION INSTITUTIONS &  
STAKEHOLDERS WORLDWIDE**

# GLOBAL EDUCATION ORGANIZATION CODE

***Global Education Organization Code*** began as the principal project of PESC's Global Data Mobility User Group.

*Global Education Organization Code* operates as a User Group and participation in User Group meetings is encouraged and open to representatives of PESC Member organizations and in collaborative partnership, to AACRAO and to Signatories and Delegates of the Groningen Declaration Network.

## ➤ ***User Group Steering Committee***

**Matt Bemis**, Associate Registrar, University of Southern California *Co-Chair*

**Lois Ferguson**, Acting Manager, Undergraduate Programs, OUAC

**Melanie Gottlieb**, Deputy Executive Director, AACRAO

**James Kelly**, Senior Director of Technology, ECE *Co-Chair*

**Dave Landry**, Director of Data Exchange Services, National Student Clearinghouse

**Herman de Leeuw**, Executive Director, Groningen Declaration Network

**David Moldoff**, CEO & Founder, AcademyOne

**Rick Skeel**, Director of Product Management, Ellucian – *CHAIR*

**Jason Weaver**, Senior Director, Products, Parchment

## ➤ ***Workgroup Participant Organizations***

AACRAO

AcademyOne

ApplyAlberta

Arizona State University

Bardic Systems

Brigham Young University

California Community Colleges

College Board

Credentials Solutions

Educational Credential Evaluators

Ellucian

Elon University

Florida International University

Georgetown University

Groningen Declaration Network

International Education Research Foundation

National Student Clearinghouse

Ontario College Application Service

Ontario Universities' Application Centre

Oracle

Paradigm

Parchment

San Francisco State University

Smart Catalog

Stanford University

University of Málaga

University of Maryland University College

University of Phoenix

University of Southern California

## OVERVIEW

A free, centralized global code list or directory does not exist for institutions and all education organizations. Without such a vital service, every college and university in the world is forced to manually map or link various and numerous codes and identifiers that may exist for the very same institution. As the number of students studying internationally grows each year, the manual labor required to secure and identify accurate institution codes increases correspondingly becoming both more intensive and error-prone.

The consequences are substantial and include:

- excessive cost due to manual processing and redundant technical resources to maintain mapping of disparate code sets
- significant delays in processing and delivery of student data and information due to a lack of efficient interoperability
- extensive risk of fraud and abuse due to untimely and sometimes inaccurate translation and inconsistencies in data matching and controls

Several critical challenges exacerbate the establishment of a directory due to the nature of disparate efforts and lack of cooperation:

- historical data must be maintained for institutions that no longer exist
- institutions that have merged or split must be represented accurately
- changes in institutional demographic data require constant maintenance
- each country maintains its own code set (many more than one set) yet no country uses or shares the same methodology in constructing and designing its respective codes sets

For these reasons, PESC and the PESC Membership have concluded that establishment of a free, open and standardized free online directory of codes and identifiers of education organizations for use by education institutions and stakeholders is now a necessity.

# GLOBAL EDUCATION ORGANIZATION CODE

## BENEFITS

Establishment of a free, open and standardized global code list or directory provides a number of benefits that can be immediately realized:

- improved data quality and integrity
- decreased risk of fraud and abuse
- faster, streamlined processing and delivery of student data and results
- an open, community-based, value-added-service like an online directory is positioned for success based on best practices in other industries (see below)
- the service is free, unlike other services which are provided on a subscription-paid basis
- the service will be designed with an open architecture using standardized web services and protocols
- institutions and organizations have already committed to using such a list once established

### EXAMPLES OF SUCCESSFUL VALUE-ADDED DIRECTORY SERVICES

Many industries collaborate to enable interoperability through use of community-based, service-driven directories.



#### ATM MACHINES

Interbank networks such as PLUS, Cirrus, STAR, and LINK require directories to identify multitudes of networks and banks in order to provide immediate consumer services and results upon request.



#### CREDIT CARDS

Networks like MasterCard and VISA require directories to identify numerous merchants and financial entities to also provide immediate services and results.



#### MORTGAGES

Mortgage companies rely on directories due to the various and disparate entities involved in the mortgage process.



#### TOLL BOOTHS

Toll booths require financially based directories and government based directories in order to operate.

## HISTORY

With an escalating, common global awareness around systems, technology and standards, PESC's footprint is correspondingly growing. PESC's Membership is expanding beyond USA, Canada and Europe and PESC Members are rapidly implementing PESC APPROVED STANDARDS in order to meet the needs of this growing digital economy.

New development ideas continue to grow within PESC as well, and the Board of Directors and Membership have been strategizing on how to meet this need.

At the Spring 2016 Data Summit in Washington, D.C., PESC launched its *Global Data Mobility* User Group. This User Group, comprised of leaders and experts across practice, policy and technology immediately identified several high profile initiatives to advance global interoperability.

The need for a *Global Education Organization Code* set surfaced as the highest priority. Leaders within PESC and the education community have been discussing this need for a number of years.

Today's technological innovation with open, transparent collaboration (the cornerstone of PESC's foundation and guiding principle) and having finally reached the tipping point whereby most experts agree that such a code set is not only needed, but now impacts data quality, cost and fraud, all contribute to the conclusion that such a list is now a necessity.

## GOVERNANCE

At the Spring 2017 Data Summit, PESC established a Steering Committee, ultimately governed by the PESC Board of Directors, to administer more direct management, oversight and strategic planning of *Global Education Organization Code*.

The Steering Committee is made up of nine (9) PESC member representatives; is diverse, representing the various sectors across education; is semi-autonomous, with reporting directly to the PESC Board of Directors, and; is responsible for the overall governance and operation of *Global Education Organization Code*.

Each Steering Committee seat has one (1) equal vote, simple majority rules decision-making and terms are one (1) year. The Steering Committee establishes its own roles, responsibilities, schedule and leadership.

*Global Education Organization Code* Steering Committee meetings occur via conference call every other Friday at 1pm EST (10am PDT, 6pm Greenwich).

*Global Education Organization Code* User Group meetings occur via conference call every quarter and communications are supported by a PESC list.

# GLOBAL EDUCATION ORGANIZATION CODE

## GUIDING PRINCIPLES

- 1) **INTENT & USE** – To provide a unique value, number or code – the **GEO CODE** – for all known postsecondary (tertiary) colleges and universities for use by organizations that require a trusted and reliable source value (number or code) when exchanging or transmitting electronic student data.
- 2) **GOVERNANCE** – PESC and the GEO CODE **Steering Committee & User Group** have full control over which institutions are added and listed in the GEO CODE directory service. Users within the education community exchanging digital records and using the GEO CODE may request additions and corrections to GEO CODE data.
- 3) **PHASE IMPLEMENTATION** – **Phase 1** focuses on colleges and universities and GEO CODE assignment is made country by country as prioritized by the User Group and Steering Committee until all colleges and universities are assigned a GEO CODE. **Phase 2** expands to all education organizations within a country.
- 4) **MINIMUM GEO CODE REQUIREMENTS** - For a college or university to be assigned a GEO CODE in the directory, the minimum data required are a unique institution ***name*** and ***location***.
  - a. *Institution location* can be a city, state, province, postal code, or a fully articulated address.
  - b. *Institution Name* must be listed in both the native language (for non-English speaking countries) and in English. Additional data may also be included, such as URL, former name, native indices within the country of origin, and other information that may be provided by ministries of education for the country of reference, or other sources deemed reliable.
- 5) **GEO CODE FORMAT** – The format of the GEO CODE is seven (7) digits:
  - a. two (2) character ISO country code, followed by a
  - b. five (5) digit alpha numeric value(e.g., #US12345)
- 6) **INSTITUTION STATUS** – Each college and university within a country is indicated as either ***active*** or ***inactive***. A reason code and explanation is provided for those with an inactive status.
- 7) **NOT ACCREDITATION** – There is no implied validity, accreditation, legal status or other official standing for institutions included in the GEO CODE service. The GEO CODE represents only the existence of the institution and provides the ability to identify that institution within an electronic data exchange transaction set. Sending and receiving parties utilizing GEO CODEs acknowledge the mutually agreed upon index assignments.
- 8) **DIPLOMA MILLS** – In addressing diploma mills and/or institutions that may be known as such, the GEO CODE directory may include diploma mills, if those diploma mills are known. A status code of ***inactive*** is assigned to institutions that may be known as a diploma mill along with a reason code of ***Other*** and may include additional explanation.

- 9) **SOURCES OF DATA** – Various sources have been used to list institutions in the GEO CODE directory. In collaboration with AACRAO, EMREX and Erasmus Without Paper, many trusted additions have been made to the GEO CODE directory. The GEO CODE Steering Committee & User Group also target countries in which institution lists may not exist or be readily available; and in these instances, Wikipedia is used. For the countries in which Wikipedia is used, manual review verifies the existence of each institution, including the address, and the URL and Wikipedia has demonstrated, with validation, to be an extremely reliable source of data. Sharing these ‘wiki-lists’ with informed parties is the last step to final inclusion in the GEO CODE directory and in the absence of other reliable data, Wikipedia will continue to be used.
- 10) **MATCHING AND DUPLICATION** – Once a GEO CODE has been assigned to an institution, that GEO CODE is not be available for reuse. For duplicates, a new entry will be considered duplicate if the institution name, city and country are identical to a GEO CODE already listed in the directory.
- 11) **USAGE IN PESC APPROVED STANDARDS** – To facilitate adoption, implementation and usage of GEO CODE and promote its benefits, GEO CODE is being added by PESC through the Standards Development Forum for Education as TransmissionData.Source.Organization.ID to all PESC APPROVED STANDARDS. PESC encourages all institutions, service providers, government agencies and vendors to adopt, implement and use the GEO CODE.
- 12) **AACRAO & GRONINGEN DECLARATION NETWORK** – PESC, the GEO CODE Steering Committee & User Group include participation and representatives from both AACRAO & the Groningen Declaration Network; and through open discussion, collaboration, webinars and presentations, these guiding principles are presented and vetted to both communities to ensure broad applicability and acceptance.
- 13) **MAINTENANCE** – To address the critical need for accuracy and maintenance of GEO CODEs, the Steering Committee & User Group have planned a rolling 5-year review process for each entry in the GEO CODE directory. To accelerate updating of information, users can also submit UPDATES and/or CORRECTIONS to PESC for the GEO CODE directory listings.

# GLOBAL EDUCATION ORGANIZATION CODE

## CURRENT STATUS

At this time, the Workgroup is proposing a *proof of concept*. This *proof of concept* entails establishment of a unique *Global Institution Code* using seven (7) digits:

- Two (2) digit ISO country code, plus
- Five (5) digit automated, alphanumeric code

To test this approach and underlying methodology, the Workgroup is assigning this unique *Global Institution Code* to institutions in the following countries:

- |                     |   |
|---------------------|---|
| ➤ <i>Antarctica</i> | ➤ <i>India</i>  |
| ➤ <i>Argentina</i>  | ➤ <i>New Zealand</i>                                    |
| ➤ <i>Australia</i>  | ➤ <i>Peoples' Republic of China, province of Taiwan</i> |
| ➤ <i>Canada</i>     | ➤ <i>Poland</i>   |
| ➤ <i>Brazil</i>     | ➤ <i>UK</i>   |
| ➤ <i>China</i>      | ➤ <i>USA</i>  |
| ➤ <i>France</i>     |   |
| ➤ <i>India</i>      |   |

This Proof of Concept is being run as a **PILOT** with PESC Members the *University of Southern California* and *IERF*. Results of the **PILOT** will be shared, analyzed and evaluated by the Workgroup to determine how successful this methodology is and how to best proceed.

The Workgroup is also expanding membership and opening participation to all stakeholders with interest in this topic through quarterly conference call meetings as interest now includes **Netherlands, Russia** and **South Korea**.

## AVAILABILITY & COST

The *Global Education Organization Code* Workgroup is still in development stage and therefore, no service is available at this time. As a driving principle and in alignment with PESC's mission, use of the *Global Education Organization Code* is free and open to the education community.

The User Group envisions availability sometime in 2018.