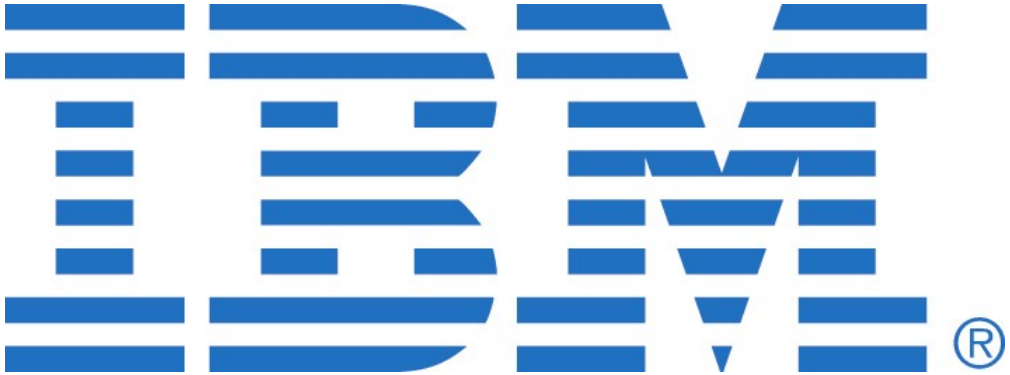

IBM + Northeastern
Creating Learner Opportunities through Digital Credentials

Kelli Jordan, IBM
Dr. Kemi Jona, Northeastern University

HOW WILL WE BUILD THE NEXT GENERATION IT WORKFORCE?

THE WORLD IS FACING A SERIOUS TALENT PROBLEM

FOUR OUT OF FIVE BUSINESSES

SAY THERE IS A **CRITICAL**

SHORTAGE OF TALENT

Aberdeen Group, 2015: Zach Lahey, “Pre-hire Assessments: An Asset for HR in the Age of the Candidate

SIGNALS ARE EMERGING

THAT WILL

DRAMATICALLY

CHANGE THE WAY WE MUST

RECOGNIZE SKILLS

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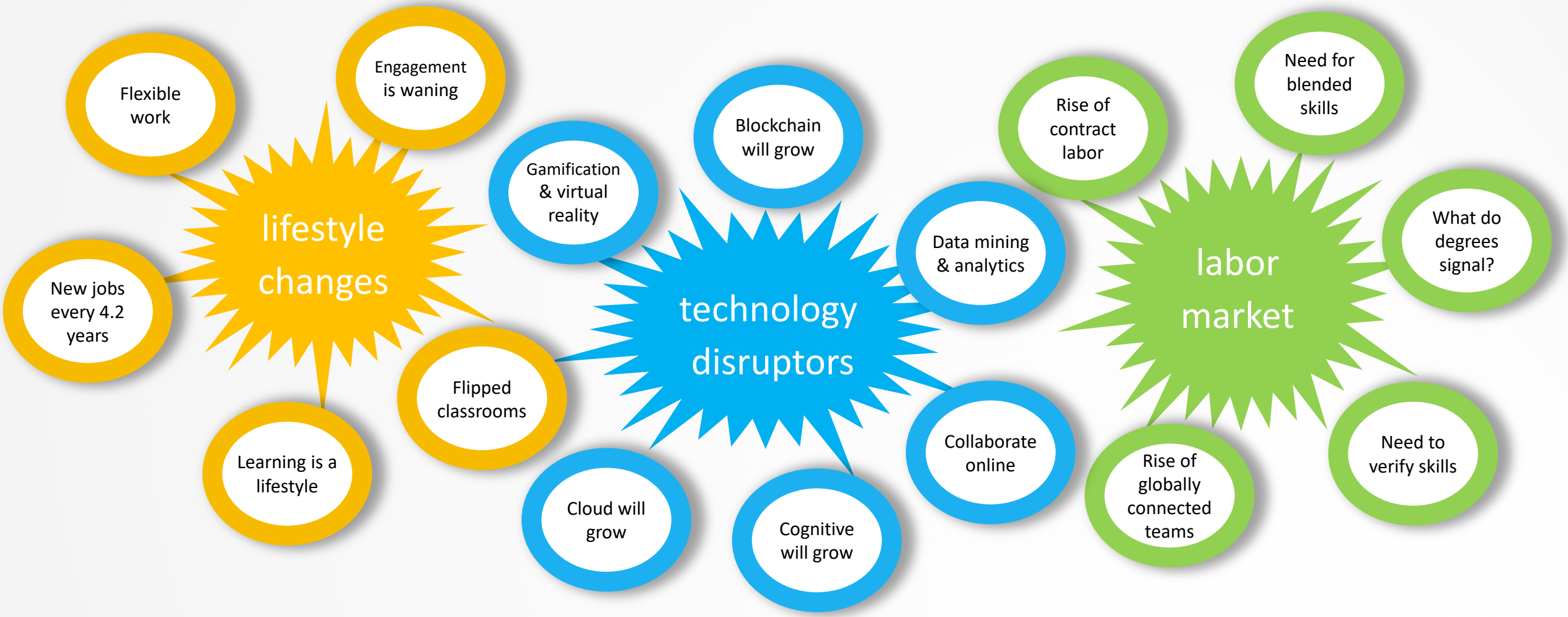
lifestyle changes
Flexible work
Engagement is waning
New jobs every 4.2 years
Learning is a lifestyle
Flipped classrooms
technology disruptors
Gamification & virtual reality
Blockchain will grow
Data mining & analytics
Cloud will grow
Cognitive will grow
Collaborate online
labor market
Rise of contract labor
Need for blended skills
What do degrees signal?
Rise of globally connected teams
Need to verify skills

THESE CHANGES WILL

REQUIRE US TO

CREATE NEW PARTNERSHIPS

TO RECOGNIZE & DEVELOP

TALENT

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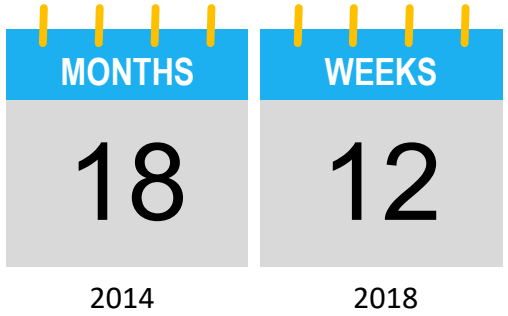
These changes required us to change and rethink how we would meet the market demand for talent



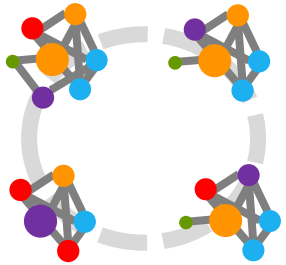
Rapid Technology Change
requires “liquid skills”

+

Shadow IT
decentralizes IT

+

Line of Business Jobs
now require IT skills



Rise of Teams
require expertise location

+

Gig Economy
requires a skills registry

+

New collar jobs
require new credentials

IBM®

EVERYTHING POINTED TO A

NEED TO

CHANGE THE WAY

WE DEVELOP AND TAKE INVENTORY OF

SKILLS

These signals required us to create a new credential structure to signal and surface capability:

Timely

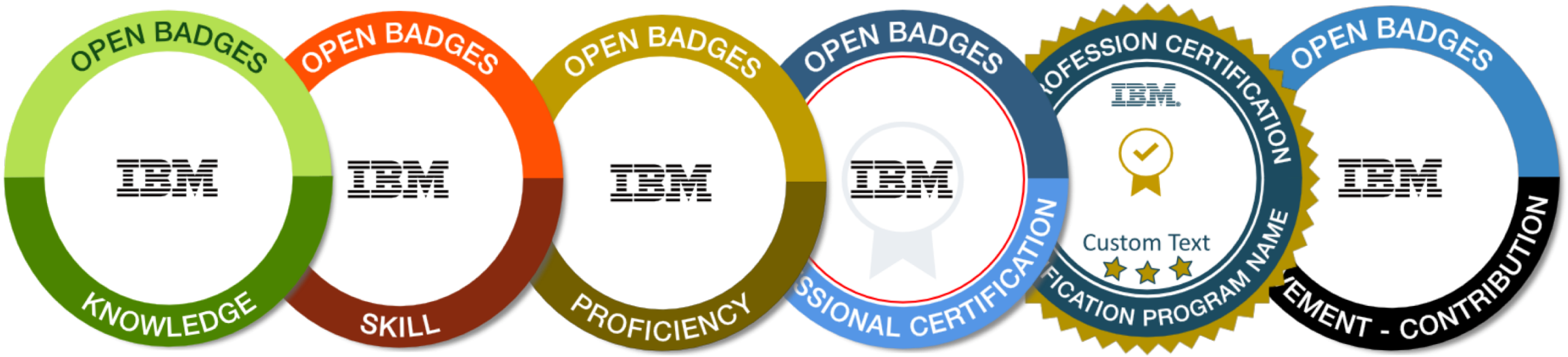
Verifiable

Portable

Discoverable

Differentiating

We developed **unique digital badges** to encompass the broad activities we host at IBM



Knowledge | Skills | Proficiency | Certified* | General

Badging is how we will measure **resume-worthy** IBM skills in the market

The results exceeded our wildest expectations

Engagement

87% increase

Certifications

57% increase

Product Trials

64% increase

Employability

92% say verifies job skills

Enrollments

125% increase

Completions

694% increase

Social Media

$50-200K per 10,000 badges

Skills Registry

191 countries

LinkedIn profiles with IBM badges **receive 6x profile views.**

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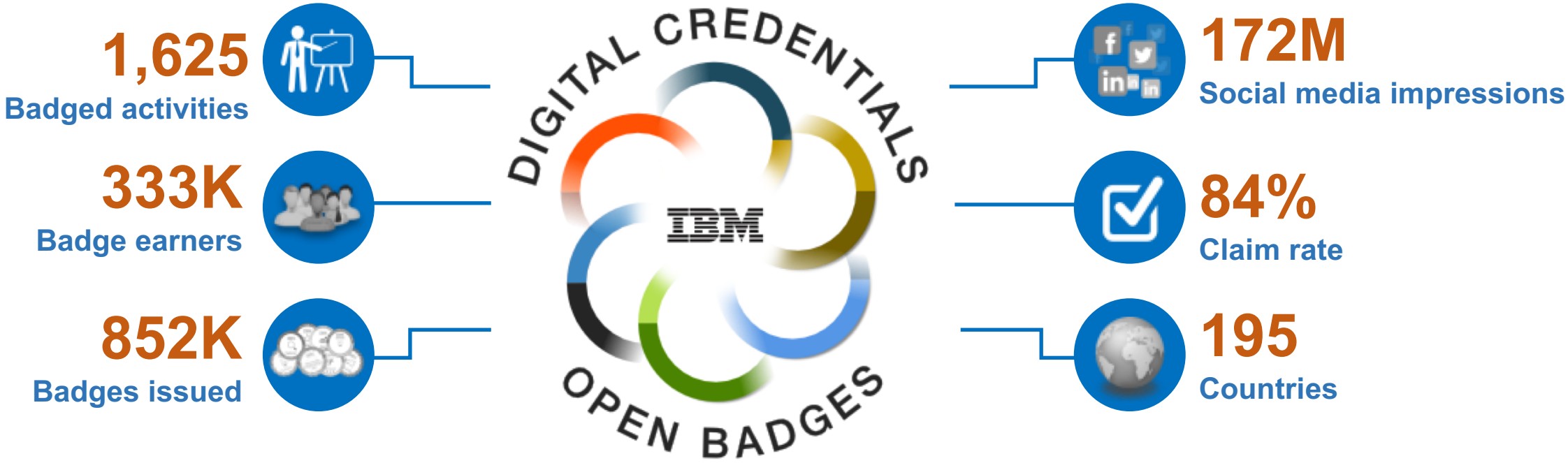
We have seen significant adoption in every internal and external group in our ecosystem

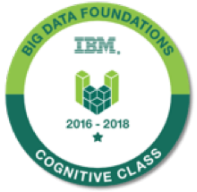


IBM badging top 10

IBM Design Thinking Practitioner

IBM Agile Explorer

Big Data Foundations - Level 1



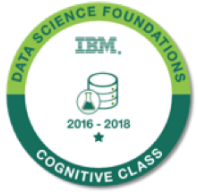
Big Data Foundations

IBM Blockchain Essentials

Cloud & Cognitive Patterns

Bluemix Essentials

Big Data Hadoop Foundations



Data Science Foundations - Level 1

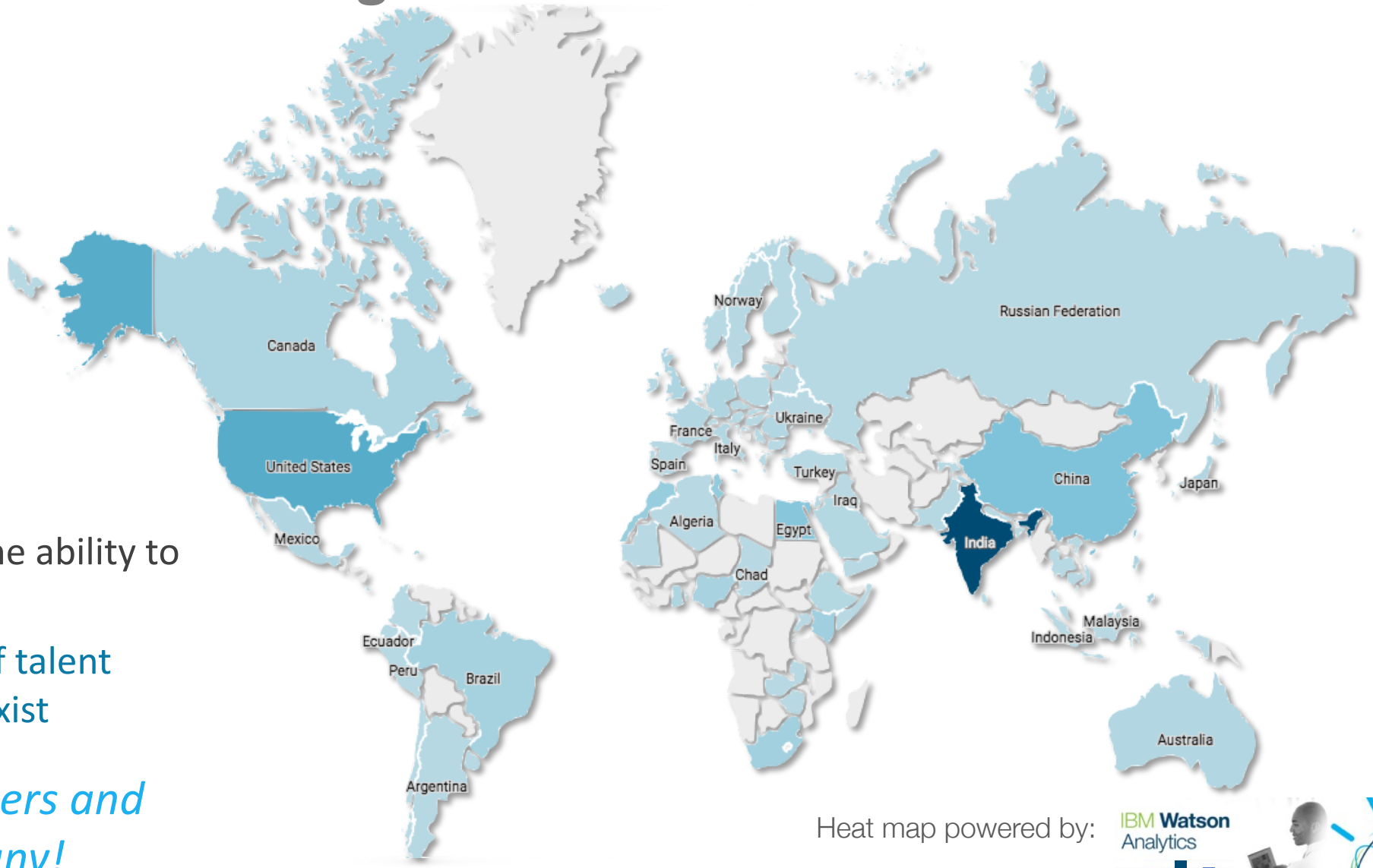
Hadoop Foundations - Level 1

IBM

We have embedded it in our culture and processes

- Managers have access to reporting and analytics
- IBM's Your Learning platform offers cognitive capabilities to search and report on employees' digital badges
- Optimizing the project staffing process through Digital Badges, to make more efficient and strategic staffing decisions
- Digital Badges are now embedded into every employee profile
- Digital badges have significantly contributed to a better coverage and accuracy of inferred expertise

Digital badges are creating heat maps of advocates, skills and skill gaps to inform business strategies



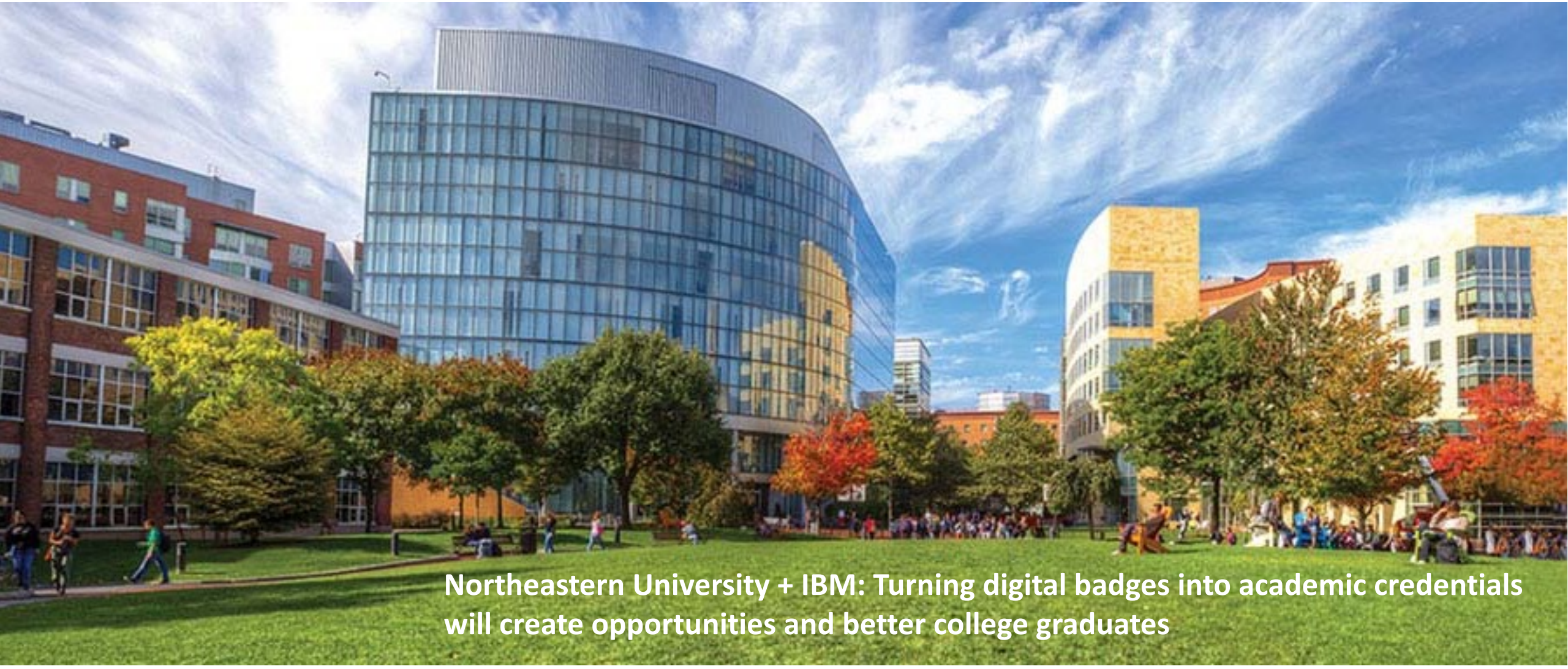
IBM **Digital Badges** provide the ability to create heat maps to…

- ✓ Understand distribution of talent
- ✓ Identify where skill gaps exist

These are brand influencers and advocates for our company!

Heat map powered by: IBM Watson Analytics

Badges now act as “digital transcripts” for college credit



Project management badge mapping

IBM Digital Badge		Advanced Standing	Graduate Credentials
	IBM Associate Project Manager	1 course or 4 Quarter Hours (PJM 5900)	1) Masters of Science in Project Management 2) Masters of Science in Program and Project Portfolio Management 3) Masters of Science in Leadership with a concentration in Project Management 4) Masters of Science in Corporate and Organizational Communication with a concentration in Project Management
	IBM Advisory Project Manager	1 course or 4 Quarter Hours (PJM 5900)	
	IBM Senior Project Manager	2 courses or 7 Quarter Hours (PJM 5900 & PJM 6000)	
	IBM Executive Project Manager	3 courses or 10 Quarter Hours (PJM 5900, PJM 6000, & 1 PJM Elective)	

http://www.northeastern.edu/ibm

Northeastern

IBM Cognitive Class Analytics badge mapping

- Free and open to the public
- Together, these individual modules combine into one 3 credit elective course advanced standing within the MPS in Analytics program
- These modules require approximately 30 hours to complete
- Students must earn an average of 85% or higher in the 'Cognitive Class Analytic Technologies' competency modules

REQUIRED MODULES FOR "COGNITIVE CLASS ANALYTICS TECHNOLOGIES":

Data Science Hands-on with Open Source Tools

Hadoop 101

Spark Fundamentals I

Scala 101

SQL Access for Hadoop

MapReduce and YARN

IBM Badges:

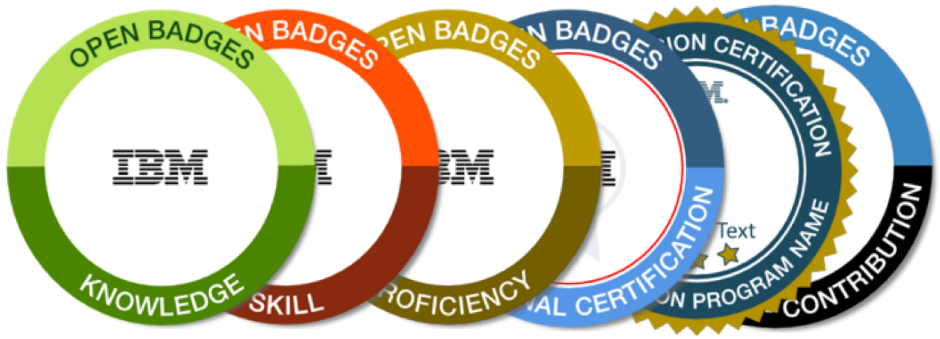
- Hadoop Foundations – Level 1
- Hadoop Programming – Level 1
- Spark – Level 1; Spark – Level 2
- Scala Programming for Data Science – Level 1

https://cognitiveclass.ai/northeastern/

Northeastern

Launching with Project Management and Analytics, we also mapped IBM's digital badges to pathways into 54 graduate degrees and 17 grad certificates across all 9 Northeastern colleges.

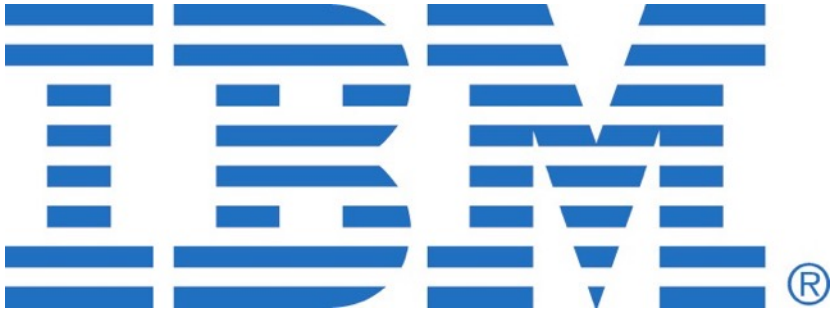
By transferring in prior learning as signified by digital badges, learners can save up to $6000 in tuition and reduce the time to a graduate degree or certificate by up to one quarter term.



Northeastern

This collaboration illustrates our shared commitment to provide innovative pathways for learners to continuously advance their skills and achieve their professional goals, eliminating the gap between work and learning.

Thank you!



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