

INSTITUTIONAL LEARNING OUTCOMES FRAMEWORK

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HUMBER GRADUATES: CAREER-READY CITIZENS

Humber graduates are ready to:

ADAPT to a rapidly evolving workplace and world

LEAD positive change locally and globally

SUCCEED in their chosen careers

To our students:

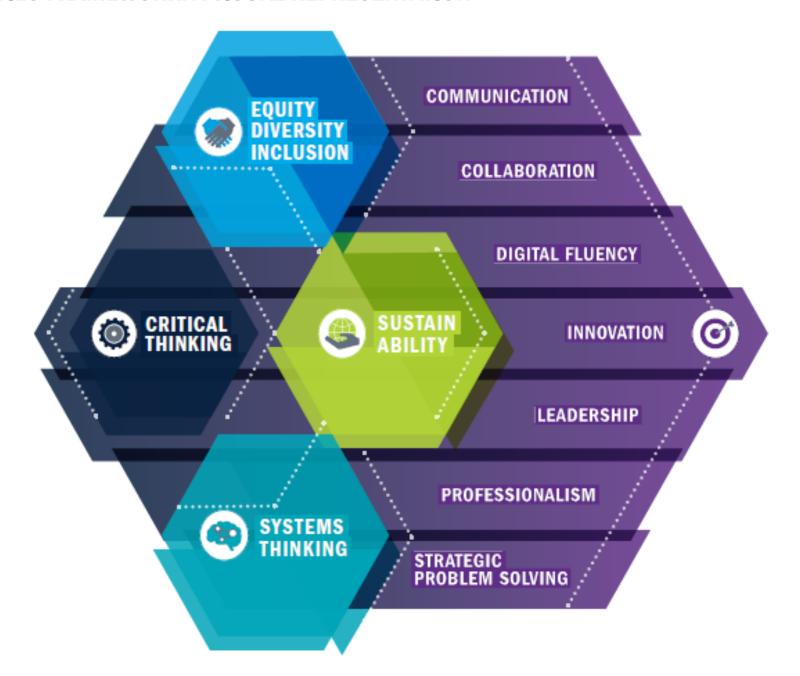
As a Humber student, you will be immersed in a transformative 21st century learning experience. You will build deep knowledge and expertise in your chosen field. At the same time, you will develop **core skills** and **mindsets** that will support your success throughout your life. These skills and mindsets will set you apart in an increasingly competitive job market. They will also differentiate you as a leader in your workplace and community.

Humber's core skills and mindsets are called our **Institutional Learning Outcomes (ILOs)**. Our ILOs define the unique qualities of Humber's polytechnic approach to education. They were developed by our faculty, staff and students in collaboration with our industry and community partners. Our ILOs also align with the top employability skills and mindsets recognized globally as critical to graduates' success now and into the future.

During your time at Humber, you will have multiple opportunities both within and outside the classroom to develop your core skills and mindsets. By taking full advantage of these opportunities, you will build your capacity to showcase what you have to offer to employers.

Whatever your goals and aspirations – wherever your future takes you – your education at Humber will lay the foundation for your success. As a Humber graduate, you will be **READY**.

THE ILO FRAMEWORK: A VISUAL REPRESENTATION



WHY AN ILO FRAMEWORK?

Being a 21st century career-ready citizen means having the knowledge and skills to achieve professional and personal success while contributing meaningfully to our communities.

Humber's ILO framework articulates the unique qualities of our graduates. The framework consists of three components - key mindsets, core skills and an overarching meta-skill - that function synergistically to form the building blocks of career-ready citizens.

Within the ILO framework, the key mindsets express a worldview focused on equity, sustainability and systems thinking. The core skills – collaboration, communication, digital fluency, innovation, leadership, professionalism and strategic problem-solving – are the practical tools that transform these key mindsets into behaviour and action. Critical thinking stands alone as the metaskill that drives all the other components of the framework.

CRITICAL THINKING: OUR META-SKILL

Meta-skills are higher-order skills that drive the performance of all other skills. At Humber, we focus on critical thinking – thinking about thinking – as the meta-skill that Humber graduates use to mobilize their core skills and key mindsets.

As critical thinkers, Humber graduates have awareness of their thinking process and apply this process to behaviour and action. They approach issues with an open mind, questioning all perspectives and systems of thought. They assess and analyze all relevant information, and accurately and comprehensively represent key issues. They communicate and collaborate effectively with others to achieve well-reasoned conclusions and make evidence-based recommendations.

CRITICAL THINKING IS:

- analysis
- evaluation
- inquiry

- awareness of self and others
- well-reasoned conclusions
- mathematical reasoning

OUR KEY MINDSETS

Mindsets shape worldviews. At Humber, we nurture three key mindsets that are crucial to the well-being and prosperity of individuals and communities: equity, diversity & inclusion (EDI), sustainability and systems thinking. These three mindsets determine the behaviour and action of Humber graduates in work and life.

EQUITY, DIVERSITY & INCLUSION

An equity, diversity & inclusion mindset enables us to create a fair, just and inclusive world. As equity-minded individuals, Humber graduates have a deep understanding of and respect for human diversity, intersectional identities and cultural complexity. They act with empathy, compassion and humility to remove barriers and create equal opportunity for all individuals and communities.

EQUITY, DIVERSITY & INCLUSION IS:

- anti-racism
- anti-oppression
- empathy, compassion & humility
- equal opportunity
- global citizenship
- intersectionality

SUSTAINABILITY

A sustainability mindset enables us to think and act with our collective future in mind. As sustainability-minded individuals, Humber graduates lead by example. They promote sustainable practices in their professional and personal lives. They act responsibly in environmental, economic and social ways that protect our planet and contribute positively to the well-being of our communities.

SUSTAINABILITY IS:

- economic responsibility
- environmental responsibility
- social & civic responsibility

SYSTEMS THINKING

A systems thinking mindset enables us to effect real change by harnessing the interconnectedness of all things. As systems thinkers, Humber graduates approach situations by knowing the limits of their own knowledge and engaging multiple perspectives. They are curious, compassionate and courageous thinkers who actively break down silos and promote holistic, emergent problem-solving.

SYSTEMS THINKING IS:

- courage
- holistic and emergent problemsolving
- interconnectedness
- limits of knowledge
- multiple perspectives

OUR CORE SKILLS

Core skills are the practical tools we need for learning, work and life in the 21st century. At Humber, we focus on seven core skills: collaboration, communication, digital fluency, innovation, leadership, professionalism and strategic problem-solving. Driven by critical thinking and shaped by our key mindsets, these core skills ensure Humber graduates have the tools to be career-ready citizens.

COLLABORATION

Collaboration skills enable individuals to work with others effectively to achieve a common goal.

COLLABORATION IS:

- active listening
- conflict resolution
- emotional intelligence

- goal-setting
- individual accountability
- self-regulation

Key words:

assist, awareness, compassion, contribution, coordination, diplomacy, feedback receptiveness, flexibility, judgement, negotiation, open-mindedness, participation, positivity, relationship management, respect, responsibility, self-reflection, teamwork

COMMUNICATION

Communication skills enable individuals to convey information effectively.

COMMUNICATION IS:

- clarity & conciseness
- credibility & integrity

- purpose & audience
- strategic networking

tone & medium

Key words:

active listening, articulate, confidence, convince, correspond, diplomacy, discuss, express, inform, listen, non-verbal empathy, open-mindedness, personal profile development, persuade, read, respect, self-reflection, share, tact, write

DIGITAL FLUENCY

Digital fluency skills enable individuals to use and adapt to digital tools, manage information, conduct research, and create and communicate effectively and ethically in digital spaces.

DIGITAL FLUENCY IS:

- data analytics
- ethics & security
- information management

- multi-platform competency
- new media literacy
- online etiquette

Key words:

access, assessment, critique and evaluate information, copyright law and licensing, cultural contexts, digital technologies, design, responsibility, professional reputation management, recognizing purpose, responsible information sharing, security and safety, self-regulation, social media literacy

INNOVATION

Innovation skills enable individuals to think creatively and critically to generate new and different ideas.

INNOVATION IS:

- curiosity
- design thinking
- entrepreneurialism

- targeted creativity
- vision

Key words:

creativity, comfort with ambiguity, connecting the dots, curiosity, divergent thinking, generative, improvisation, incubation, intuition, inventive lateral thinking, navigating the grey, predictive thinking, rigor

LEADERSHIP

Leadership skills enable individuals to inspire, motivate and empower others to achieve positive, common goals.

LEADERSHIP IS:

- coaching & mentoring
- empowerment of others
- mentoring
- being a positive influencer

- role-modelling
- vision
- working in diversity

Key words:

awareness, change-maker, collaboration, commitment, communication, conviction, cooperation, courage, delegation, diplomacy, empathy, ethics, facilitation, fearless agility, feedback, honesty, humility, initiative, integrity, motivation, passion, perseverance, persuasion, positivity, prioritization, reducing ambiguity, reliability, resolving problems, responsibility, self-reflection, trustworthiness

PROFESSIONALISM

Professionalism enables an individual to exhibit behaviour and actions that enhance personal reputation and contribute positively to success in the workplace.

PROFESSIONALISM IS:

- accountability
- adaptability
- confidence
- ethics & responsibility

- field/industry readiness
- resilience
- resourcefulness

Key words:

communication, continuous learning, emotional intelligence, enthusiasm and engagement, flexibility, honesty, humility, initiative, integrity, leadership, organization, passion, perceptiveness, persistence, positivity, prioritization, respect, self-reflexivity, self-regulation, time management, trustworthiness

STRATEGIC PROBLEM-SOLVING

Strategic problem-solving skills enable an individual to predict and define a problem, and to determine the best approach to achieving a solution.

STRATEGIC PROBLEM-SOLVING IS:

- applying knowledge, skills and prior experience
- critical judgement
- context awareness

- effective decision-making
- evaluation of merits of solutions
- pre-emptive evaluation

Key words:

analysis, application, assess, decision making, develop, evaluation, idea generation, identify, initiative, iteration, judgement, lateral thinking, making connections, methodology, open-mindedness, patterns, planning, process, risk management, self-directed, transformative thinking, trends

RESOURCES

Meta-skill: Critical thinking

Faculty resources:

AACU. (n.d.). *Critical Thinking VALUE Rubric*. Retrieved from https://www.aacu.org/value/rubrics/critical-thinking

Assessing Learning Outcomes: Thinking Critically about Critical Thinking and Written Communication Skills

(http://www.heqco.ca/SiteCollectionDocuments/Formatted_LOAC_Humber.pdf)

Facione, P. (2013). *Critical thinking: What it is and why it counts*. Retrieved from https://www.insightassessment.com/Resources/Importance-of-Critical-Thinking/Critical-Thinking-What-It-Is-and-Why-It-Counts

Foundation for Critical Thinking. (2015). *Critical thinking: Where to begin.* Retrieved from http://www.criticalthinking.org/pages/critical- thinking- where- to- begin/796

McGuire, S. Y. (2015). Teach students how to learn: strategies you can incorporate into any course to improve student metacognition, study skills, and motivation. Sterling, VA: Stylus Publishing.

Scriven, M., & Paul, R. (1987). *Defining critical thinking*. Retrieved from http://www.criticalthinking.org/pages/defining-critical-thinking/766

Tanner, K. (2012). Promoting Student Cognition. CBE – Life Sciences Education 11, 113-120.

The American Philosophical Association. (1990). Critical thinking: A statement of expert consensus for purposes of educational assessment and instruction. Milbrae, CA: The California Academic Press.

University of New South Wales. (n.d.). *Critical Thinking*. Retrieved from https://student.unsw.edu.au/critical-thinking

University of Waterloo. (n.d.). *Teaching Metacognitive Skills*. Retrieved from https://uwaterloo.ca/centre-for-teaching-excellence/teaching-resources/teaching-tips/metacognitive

Vanderbilt University. (n.d.). *Metacognition*. Retrieved from https://cft.vanderbilt.edu/guides-sub-pages/metacognition/

Other institutions on critical thinking:

Central Piedmont Community College. (n.d.). *Critical Thinking*. Retrieved from https://www.cpcc.edu/criticalcore/competencies_key_indicators/critical-core-education/critical-thinking

Dublin Institute of Technology. (n.d.). *Critical Thinker*. Retrieved from http://www.dit.ie/teaching/graduateattributes/criticalthinker/

Loughborough University. (n.d.). *Reflective and articulate*. Retrieved from http://www.lboro.ac.uk/students/graduate-attributes/reflective-articulate/

Rasmussen College. (n.d.). *Critical Thinking*. Retrieved from http://guides.rasmussen.edu/criticalthinking

Seneca College. (n.d.). *Critical Thinking and Problem Solving*. Retrieved from http://open2.senecac.on.ca/sites/coreliteracies/critical-thinking-and-problem-solving/

University of Plymouth. (n.d.). *The critical and creative learner*. Retrieved from https://www.plymouth.ac.uk/your-university/teaching-and-learning/plymouth-compass/the-critical-and-creative-learner

Seneca College. (n.d.). Critical Thinking and Problem Solving. Retrieved from http://open2.senecac.on.ca/sites/coreliteracies/critical-thinking-and-problem-solving/

University of Plymouth. (n.d.). The critical and creative learner. Retrieved from https://www.plymouth.ac.uk/your-university/teaching-and-learning/plymouth-compass/the-critical-and-creative-learner

Key mindsets

Equity, diversity & inclusion

Faculty resources:

AACU. (n.d.). *Civic Engagement VALUE Rubric*. Retrieved from https://www.aacu.org/civic-engagement-value-rubric

AACU. (n.d.). *Ethical Reasoning VALUE Rubric*. Retrieved from https://www.aacu.org/ethical-reasoning-value-rubric

AACU. (n.d.). *Intercultural Knowledge and Competence VALUE Rubric*. Retrieved from https://www.aacu.org/value/rubrics/intercultural-knowledge

CORE Education. (2015). *Ten Trends 2015: Global connectedness*. Retrieved from https://www.core-ed.org/research-and-innovation/ten-trends/2015/global-connectedness/

CORE Education. (2016). *Ten Trends 2016: Diversity*. Retrieved from https://www.core-ed.org/research-and-innovation/ten-trends/2016/diversity/

De La Mare, D.M. (April 2013). Dialogue Across Lines of Difference: Acknowledging and Engaging Diverse Identities in the Classroom. *Communications Teacher* 27(2), 71-75.

Humber College. (n.d.). *Global Citizenship Certificate*. Retrieved from https://humber.ca/global-opportunities/global-citizenship.html

Humber College. (2013). *Human Rights Policy*. Retrieved from http://humber.ca/policies/human-rights-policy

Humber Diversity Committee. (2016). *Key Human Rights and Equity Terms*. Retrieved from https://hrs.humber.ca/assets/files/human_rights/Key_Human_Rights_and_Equity_Terms_Augus t 2016.pdf

Okanagan Charter: An International Charter for Health Promoting Universities and Colleges (2015). Retrieved from

https://internationalhealthycampuses2015.sites.olt.ubc.ca/files/2016/01/Okanagan-Charter-January13v2.pdf

Ramaley, J.A. (2014). Educating for a Changing World: The Importance of an Equity Mindset. *Metropolitan Universities* 25(3), 5-15.

The Washington Center. (n.d.). *Equity Mindsets*. Retrieved from http://wacenter.evergreen.edu/equity-mindsets

Truth and Reconciliation Commission of Canada. (2015). Truth and Reconciliation Commission of Canada: Calls to Action. Retrieved from http://nctr.ca/assets/reports/Calls_to_Action_English2.pdf

UNESCO. (2015). *Global Citizenship Education*. Retrieved from http://unesdoc.unesco.org/images/0023/002329/232993e.pdf

United Nations. (2015). Sustainable Development Goals. Retrieved from https://sustainabledevelopment.un.org/sdgs

Other institutions on equity, diversity & inclusion:

Dublin Institute of Technology. (n.d.). *Ethical*. Retrieved From http://www.dit.ie/teaching/graduateattributes/ethical/

Dublin Institute of Technology. (n.d.). *Global Citizen*. Retrieved from http://www.dit.ie/teaching/graduateattributes/globalcitizen/

Griffith University. (n.d.). *Effective in culturally diverse and international environments*. Retrieved from https://teaching-resources.griffith.edu.au/the-griffith-graduate/griffith-attributes/effective-in-culturally-diverse-and-international-environments

Loughborough University. (n.d.). *Caring, ethical and with integrity*. Retrieved from http://www.lboro.ac.uk/students/graduate-attributes/caring-ethical-integrity/

Rasmussen College. (n.d.). *Diversity & Teamwork*. Retrieved from http://guides.rasmussen.edu/diversity

Seneca College. (n.d.). Ethical reasoning, personal and social responsibility. Retrieved fro m http://open2.senecac.on.ca/sites/coreliteracies/ethical-reasoning-personal-and-social-responsibility/

Seneca College. (n.d.). *Intercultural Knowledge and Global Perspective*. Retrieved from http://open2.senecac.on.ca/sites/coreliteracies/global/

University of Edinburgh. (n.d.). *Mindset: Outlook and Engagement*. Retrieved from https://www.ed.ac.uk/employability/graduate-attributes/framework/outlook-and-engagement

University of Plymouth. (n.d.). *The sustainable and global citizen*. Retrieved from https://www.plymouth.ac.uk/your-university/teaching-and-learning/plymouth-compass/the-sustainable-and-global-citizen

Sustainability

Faculty resources:

AACU. (n.d.). *Global Learning VALUE Rubric*. Retrieved from https://www.aacu.org/value/rubrics/global

Bieler, A., & McKenzie, M. (2017, January 24). Strategic Planning for Sustainability in Canadian Higher Education. *Sustainability*, *9*(2), 161-182. Retrieved from http://dx.doi.org/10.3390/su9020161

Buckler, C., & Creech, H. (2014). Shaping the Future We Want: UN Decade of Education. Retrieved from

https://sustainabledevelopment.un.org/content/documents/1682Shaping%20the%20future%20we%20want.pdf

CMEC. (2012). Education for Sustainable Development in Canadian Faculties of Education. Retrieved from

https://www.cmec.ca/Publications/Lists/Publications/Attachments/279/ESD Dean reportEN.pdf

CORE Education. (2016). *Ten Trends 2016: Sustainability.* Retrieved from https://www.core-ed.org/research-and-innovation/ten-trends/2016/sustainability/

Denby, L., & Rickards, S. (2016). An Approach to Embedding Sustainability into Undergraduate Curriculum: Macquarie University, Australia Case Study. In W.L. Filho & P. Pace (Eds.), *Teaching Education for Sustainable Development at University Level*. World Sustainability Series, DOI 10.1007/978-3-319-32928-4_2.

Forum for the Future. (2004, February). *Learning and Skills for Sustainable Development*: Developing a sustainability literate society. Retrieved from https://www.forumforthefuture.org/sites/default/files/project/downloads/learningandskills.pdf

Humber College. (2015, October). *Sustainability as an Essential Employability Skill*. Unpublished internal document, Humber College.

Humber College. (2014). *Humber College Sustainability Plan 2014-2019.* Retrieved from http://humber.ca/sustainability/sites/default/files/uploads/documents/HumberSustainabilityPlanFI NAL.pdf

Government of Canada. (n.d.). *Sustainability*. Retrieved from https://www.canada.ca/en/services/environment/conservation/sustainability.html

Pickard, G. (2013). Re-Orienting Post-Secondary Educational Practice Toward Sustainability: The "Gravity" of It All. Retrieved from

http://uregina.ca/~pickard/Reorienting%20Postsecondary%20Education%20Towards%20Sustainability%20-%20the%20%27Gravity%27%20of%20It%20All%20copy.pdf

Slejko, C., & Dempsey, M. (2014). *Integrating Sustainability Into the Curriculum*. Retrieved from https://www.northlakecollege.edu/au/sustainability/sustsummit/2014/documents/sustainability%2 Osummit%20presentation.pdf

United Nations. (n.d.). Sustainable Development Goals. Retrieved from https://sustainabledevelopment.un.org/sdgs

United Nations Foundation. (n.d.). *United Nations Foundation Blog*. Retrieved from http://unfoundationblog.org

Vanderbilt University. (n.d.). *Teaching Sustainability*. Retrieved from https://cft.vanderbilt.edu/guides-sub-pages/teaching-sustainability/

Other institutions on sustainability:

Sterling College. (n.d.). *Environmental Stewardship*. Retrieved from https://sterlingcollege.edu/environmental-stewardship/

University of Plymouth. (n.d.). *The sustainable and global citizen*. Retrieved from https://www.plymouth.ac.uk/your-university/teaching-and-learning/plymouth-compass/the-sustainable-and-global-citizen

Systems thinking

Faculty resources:

AACU. (n.d.). *Inquiry and Analysis VALUE Rubric*. Retrieved from https://www.aacu.org/value/rubrics/inquiry-analysis

Acarogu, L. (2017). *Tools of a Systems Thinker*. Retrieved from https://medium.com/disruptive-design/tools-for-systems-thinkers-the-6-fundamental-concepts-of-systems-thinking-379cdac3dc6a

Chettiparamb, A. (2007). *Interdisciplinarity: a literature review*. Retrieved from https://www.heacademy.ac.uk/knowledge-hub/interdisciplinarity-literature-review

Goodman, M. (n.d.). *Systems Thinking: What, Why, When, Where, and How?* Retrieved from https://www.ed.ac.uk/employability/graduate-attributes/framework/outlook-and-engagement

Learning for Sustainability. (n.d.). *Systems Thinking*. Retrieved from http://learningforsustainability.net/systems-thinking/

Minnesota Office of Environmental Assistance. (2002). Environmental Literacy Scope and Sequence: Providing a Systems Approach to Environmental Education in Minnesota. Retrieved from http://seek.minnesotaee.org/sites/default/files/ScopeandSequence02.pdf

The Open University. (n.d.). Systems thinking and practice. Retrieved from http://www.open.edu/openlearn/science-maths-technology/computing-and-ict/systems-computer/systems-thinking-and-practice/content-section-0?active-tab=description-tab

Other institutions on systems thinking:

Seneca College. (n.d.). *Inquiry and Analysis*. Retrieved from http://open2.senecac.on.ca/sites/coreliteracies/inquiry-and-analysis/

Core skills

Collaboration

Faculty resources:

AACU. (n.d.). *Teamwork VALUE Rubric*. Retrieved from https://www.aacu.org/value/rubrics/teamwork

CORE Education. (n.d.). *Ten Trends 2017: Collaboration*. Retrieved from https://www.core-ed.org/research-and-innovation/ten-trends/2017/collaboration/

Cornell University. (n.d.). *Collaborative Learning: Group Work*. Retrieved from https://www.cte.cornell.edu/teaching-ideas/engaging-students/collaborative-learning.html

Humber College. (n.d.). *Applied Research and Innovation*. Retrieved from https://www.humber.ca/research/about/#tab-banner-mobile

Humber College. (n.d.). Centre for Entrepreneurship. Retrieved from https://humber.ca/cfe/

JISC. (2018). *Building digital capability*. Retrieved from https://www.jisc.ac.uk/rd/projects/building-digital-capability

Laal, M., & Ghodsi, S.M. (2012). Benefits of collaborative learning. *Procedia – Social and Behavioral Sciences*, *31*, 486-490.

Thought Farmer. (2018). *What Collaboration Really Means*. Retrieved from https://www.thoughtfarmer.com/what-collaboration-really-means/

TED Talks. (n.d.). Collaboration. Retrieved from https://www.ted.com/topics/collaboration

Vanderbilt University. (n.d.). *Group work: Using cooperative learning groups effectively.* Retrieved from https://cft.vanderbilt.edu/guides-sub-pages/setting-up-and-facilitating-groups-work-using-cooperative-learning-groups-effectively/

Other institutions on collaboration:

Dublin Institute of Technology. (n.d.). *Active team player*. Retrieved from http://www.dit.ie/teaching/graduateattributes/activeteamplayer/

Dublin Institute of Technology. (n.d.). *Collaborative worker*. Retrieved from http://www.dit.ie/teaching/graduateattributes/collaborativeworker/

Griffith University. (n.d.). *Effective communicators and collaborators*. Retrieved from https://teaching-resources.griffith.edu.au/the-griffith-graduate/griffith-attributes/effective-communicators-and-collaborators

Loughborough University (n.d.). *Versatile team worker*. Retrieved from http://www.lboro.ac.uk/students/graduate-attributes/versatile-team-worker/

Rasmussen College. (n.d.). *Diversity & Teamwork.* Retrieved from http://guides.rasmussen.edu/diversity

University of Plymouth. (n.d.). *The competent and confident professional*. Retrieved from https://www.plymouth.ac.uk/your-university/teaching-and-learning/plymouth-compass/the-competent-and-confident-professional

Communication

Faculty resources:

AACU. (n.d.). *Oral Communication VALUE Rubric*. Retrieved from https://www.aacu.org/value/rubrics/oral-communication

AACU. (n.d.). *Written Communication VALUE Rubric*. Retrieved from https://www.aacu.org/value/rubrics/written-communication

Other institutions on communication:

Dublin Institute of Technology. (n.d.). *Excellent Communicator*. Retrieved from http://www.dit.ie/teaching/graduateattributes/excellentcommunicator/

Griffith University. (n.d.). *Effective communicators and collaborators*. Retrieved from https://teaching-resources.griffith.edu.au/the-griffith-graduate/griffith-attributes/effective-communicators-and-collaborators

Rasmussen College. (n.d.). *Communication*. Retrieved from http://guides.rasmussen.edu/communication

Seneca College. (n.d.). *Oral Communication*. Retrieved from http://open2.senecac.on.ca/sites/coreliteracies/oral-communication/

Seneca College. (n.d.). *Written Communication*. Retrieved from http://open2.senecac.on.ca/sites/coreliteracies/written-communication/

University of Edinburgh. (n.d.). *Skills: Communication*. Retrieved from https://www.ed.ac.uk/employability/graduate-attributes/framework/communication

University of Plymouth. (n.d.). The *competent and confident professional*. Retrieved from https://www.plymouth.ac.uk/your-university/teaching-and-learning/plymouth-compass/the-competent-and-confident-professional

Digital fluency

Faculty resources:

Hadziristic, T. (2017). *The State of Digital Literacy in Canada: A Literature Review. Retrieved* from http://brookfieldinstitute_ca/wp-content/uploads/2017/04/BrookfieldInstitute_State-of-Digital-Literacy-in-Canada_LiteratureReview.pdf

CORE Education. (2016). *Ten Trends 2016: Digital Fluency*. Retrieved from https://www.core-ed.org/research-and-innovation/ten-trends/2016/digital-fluency/

CORE Education. (2015). *What is digital fluency?* Retrieved from http://blog.core-ed.org/blog/2015/10/what-is-digital-fluency.html

Levy, L.A. (2018). *Checklist: Skills and Tools for Digitally Literate Teachers*. Retrieved from https://rossieronline.usc.edu/blog/digital-literacy-checklist/

OSAPAC. (n.d.). Digital Citizenship. Retrieved from https://www.osapac.ca/dc/

The Learning Portal. (n.d.). *Digital Citizenship Hub*. Retrieved from https://tlp-lpa.ca/digital-citizenship/home

Other institutions on digital fluency:

Dublin Institute of Technology. (n.d.). *Digitally literate*. Retrieved from http://www.dit.ie/teaching/graduateattributes/digitallyliterate/

Rasmussen College. (n.d.). *Digital Fluency*. Retrieved from http://guides.rasmussen.edu/digitalfluency

Seneca College. (n.d.). *Digital Literacy*. Retrieved from http://open2.senecac.on.ca/sites/coreliteracies/digital-literacy/

Innovation

Faculty resources:

AACU. (n.d.). *Creative Thinking VALUE Rubric*. Retrieved from https://www.aacu.org/value/rubrics/creative-thinking

Canadian Foundation for Innovation. (n.d.). *Canadian Foundation for Innovation*. Retrieved from https://www.innovation.ca/

CORE Education. (2015). *Ten Trends 2015: Innovation and entrepreneurship.* Retrieved from https://www.core-ed.org/research-and-innovation/ten-trends/2015/innovation-and-entrepreneurship/

CORE Education. (2016). *Ten Trends 2016: Design thinking.* Retrieved from https://www.core-ed.org/research-and-innovation/ten-trends/2016/design-thinking/

Humber College. (n.d.). *Applied Research and Innovation*. Retrieved from https://www.humber.ca/research/about/#tab-banner-mobile

Humber College. (n.d.). Centre for Entrepreneurship. Retrieved from https://humber.ca/cfe/

Foster, J., & Yaoyuneyong, G. (2016). Teaching innovation: equipping students to overcome real-world challenges. *Higher Education Pedagogies* 1(1), 42-56.

Naiman, L. (n.d.). *Design Thinking as a Strategy for Innovation*. Retrieved from https://www.creativityatwork.com/design-thinking-strategy-for-innovation/

Other institutions on innovation:

Dublin Institute of Technology. (n.d.). *Innovator*. Retrieved from http://www.dit.ie/teaching/graduateattributes/innovator/

Dublin Institute of Technology. (n.d.). *Entrepreneur*. Retrieved from http://www.dit.ie/teaching/graduateattributes/entrepreneur/

Griffith University. (n.d.). *Innovative, creative and entrepreneurial*. Retrieved from https://teaching-resources.griffith.edu.au/the-griffith-graduate/griffith-attributes/innovative-creative-and-entrepreneurial

Loughborough University. (n.d.). *Innovative and enterprising*. Retrieved from http://www.lboro.ac.uk/students/graduate-attributes/innovative-enterprising/

Seneca College. (n.d.). *Creative Thinking*. Retrieved from http://open2.senecac.on.ca/sites/coreliteracies/creative-thinking/

University of Plymouth. (n.d.). *The critical and creative learner*. Retrieved from https://www.plymouth.ac.uk/your-university/teaching-and-learning/plymouth-compass/the-critical-and-creative-learner

Leadership

Faculty resources:

Cable, D. (2018). *How Humble Leadership Really Works*. Retrieved from https://hbr.org/2018/04/how-humble-leadership-really-works

CORE Education. (2016). *Ten Trends 2016: Change Leadership*. Retrieved from https://www.core-ed.org/research-and-innovation/ten-trends/2016/change-leadership/

Giles, S. (2016). The Most Important Leadership Competencies, According to Leaders Around the World. Retrieved from https://hbr.org/2016/03/the-most-important-leadership-competencies-according-to-leaders-around-the-world

Harvard Business Review. (2016). *What Makes a Leader?* Retrieved from https://hbr.org/video/5236216251001/what-makes-a-leader

University of Kent. (n.d.). *How to find out your leadership style*. Retrieved from https://www.kent.ac.uk/careers/sk/leadership.htm

Other institutions on leadership:

Dublin Institute of Technology. (n.d.). *Decision maker*. Retrieved from http://www.dit.ie/teaching/graduateattributes/decisionmaker/

Dublin Institute of Technology. (n.d.). *Leader*. Retrieved from http://www.dit.ie/teaching/graduateattributes/leader/

Professionalism

Other institutions on professionalism:

Dublin Institute of Technology. (n.d.). *Emotionally intelligent*. Retrieved from http://www.dit.ie/teaching/graduateattributes/emotionallyintelligent/

Dublin Institute of Technology. (n.d.). *Ethical*. Retrieved From http://www.dit.ie/teaching/graduateattributes/ethical/

Dublin Institute of Technology. (n.d.). *Motivated self-starter*. Retrieved from http://www.dit.ie/teaching/graduateattributes/motivatedself-starter/

Loughborough University. (n.d.). *Reliable and committed*. Retrieved from http://www.lboro.ac.uk/students/graduate-attributes/reliable-committed/

Loughborough University. (n.d.). *Resilient and adaptable*. Retrieved from http://www.lboro.ac.uk/students/graduate-attributes/resilient-adaptable/

Rasmussen College. (n.d.). *Ethics & Professional Responsibility.* Retrieved from http://guides.rasmussen.edu/ethics

Seneca College. (n.d.). *Ethical Reasoning, Personal and Social Responsibility*. Retrieved from http://open2.senecac.on.ca/sites/coreliteracies/ethical-reasoning-personal-and-social-responsibility/

University of Plymouth. (n.d.). *The competent and confident professional*. Retrieved from https://www.plymouth.ac.uk/your-university/teaching-and-learning/plymouth-compass/the-competent-and-confident-professional

Strategic problem-solving

Faculty resources:

AACU. (n.d.). *Problem Solving VALUE Rubric*. Retrieved from https://www.aacu.org/value/rubrics/problem-solving

ASQ. (n.d.). *Problem Solving*. Retrieved from http://asq.org/learn-about-quality/problem-solving/overview/overview.html

MindTools. (n.d.). *What is Problem Solving?* Retrieved from https://www.mindtools.com/pages/article/newTMC_00.htm

Rajput, W. (2015). Strategic Thinking: Creative Approach to Complex Problem Solving and Growth. Retrieved from https://www.linkedin.com/pulse/strategic-thinking-creative-approach-complex-problem-solving-rajput/

University of Kent. (n.d.). *Problem Solving and Analytical Skills*. Retrieved from https://www.kent.ac.uk/careers/sk/problem-solving-skills.htm

Vanderbilt University. (n.d.). *Teaching Problem Solving*. Retrieved from https://cft.vanderbilt.edu/quides-sub-pages/problem-solving/

Other institutions on strategic problem-solving:

Dublin Institute of Technology. (n.d.). *Problem solver*. Retrieved from http://www.dit.ie/teaching/graduateattributes/problemsolver/

Dublin Institute of Technology. (n.d.). *Strategic thinker*. Retrieved from http://www.dit.ie/teaching/graduateattributes/strategicthinker/

Seneca College. (n.d.). *Critical Thinking and Problem Solving*. Retrieved from http://open2.senecac.on.ca/sites/coreliteracies/critical-thinking-and-problem-solving/

University of Plymouth. (n.d.). *The critical and creative learner*. Retrieved from https://www.plymouth.ac.uk/your-university/teaching-and-learning/plymouth-compass/the-critical-and-creative-learner