

# Advancing Opportunity and Equity

# Defining the Challenge

Knowledge is the cornerstone of democracy and opportunity. The vitality of our society depends on an informed citizenry and skilled workforce, yet opportunity disparities in education, health, and employment continue to limit human capital. Research is needed to build deep knowledge of the factors that promote an informed and equitable society and to expand individual opportunity and promote social justice. WSU research relevant to this Grand Challenge addresses long-standing as well as new challenges to equality and opportunity, ranging from limited numbers of people from historically underrepresented groups and women entering STEM disciplines to inequities associated with the digital divide, health care, and fragmentation of the political landscape. Building an educated society with opportunities for all requires research across the spectrum of society itself, from political science to business, from communication to psychology, and from the humanities to the arts. It involves big data, culturally sensitive qualitative research, and an examination of pedagogical practices at every level and component of our nation's educational systems.

### WSU's Role in the Solution

WSU has significant research capacity to investigate the causes and consequences of inequality of access and opportunity in education, economic opportunity, and access to health care and information. Faculty members from a broad range of disciplines contribute to our understanding of how economic, health, and social conditions impact opportunity. Humanists and artists explore past and present dimensions of society that help us better understand our humanity. Faculty in social sciences, economics, statistics, and education conduct important research crucial to exploring, evaluating, and modeling educational, economic, and other societal outcomes. Researchers across multiple colleges study the digital divide, media and politics, and the role of information access in ameliorating health disparities. Several unique centers, such as the Social and Economic Sciences Research Center; Center for Environmental Research, Education, and Outreach; IMPACT Center; and Center for Social and Environmental Justice, conduct and disseminate research addressing environmental justice issues that impact social and economic opportunities in a diverse citizenry. The Thomas S. Foley Institute for Public Policy and Public Service examines issues such as the role of civility in American politics. The Learning and Performance Research Center studies the malleable factors related to success in work and learning environments, develops and evaluates statistical and methodological innovations, and provides evidence-based meta-analyses to evaluate program interventions. Over 100 WSU researchers conduct collaborative STEM education research from early grades to graduate school, a vital aspect of social and economic opportunity. A key feature of this work is research that focuses on clinical education. Faculty in nursing, veterinary medicine, pharmacy, human medicine, and nutrition and exercise science conduct research that informs clinical education modalities. As a result, students receive state-of-the-art instruction that

inspires, elevates confidence, and readies them to save lives. Across WSU, the combined efforts of social science and clinical science faculty toward addressing inequality, information access, health and education outcomes, and education practice and policy, illustrate how WSU is working to create opportunity and make a better life for all in Washington and beyond.

## Key Research Themes

- Examining the causes and consequences of inequality of opportunity
  - Causes and consequences of injustice and inequality
  - Understand history and its relevance to contemporary society
  - Social and cultural context of science and technology
  - Media's influence in shaping societal and political discourse
  - Cultural studies in education
- Promoting equity for individuals and communities
  - Understand gender, race, and culture through artistic expression and critical inquiry
  - Understand diversity from genetic through cultural levels of analysis
  - Injustice and inequality
  - Distribution of resources
  - Educational access
- Furthering economic, educational, and social policies that impact opportunity, societal cohesion, and engagement
  - Robust analytic and modeling strategies
  - Democratization of information and digital access
  - Global competition and its impact on the United States and world economies
  - Media psychology and communication processes and effects
- Improving formal and informal education throughout the lifespan
  - STEM education and educational pipelines
  - Cultural studies in education
  - Neuroscience and neuropsychology of education
  - Community public health
  - The role of technology in education

# Descriptive Sentences of Each Key Research Theme

- 1. **Examining the causes and consequences of inequality of opportunity.** The historical narrative of the United States shapes the social and economic justice landscape of today. Political, social, economic, and educational policies serve to improve or limit opportunities available in society. Beyond these societal factors within the United States, the impacts of globalization and other multinational meta-trends infuse further complexity into efforts to promote social justice.
- 2. **Promoting equity for individuals and communities.** By diagnosing political, social, economic, and educational inequality and opportunity, scholars can offer evidence-based solutions to redress historical and contemporary inequities. This research involves analyzing the global dimensions of business, examining the impact of STEM education on access and achievement, studying the behavioral aspects of social systems, and using data sciences and modeling to study human and natural systems. This line of research also focuses on the relative importance of traditional education, the role of digital access, the impact of media, and the more informal means of communication.
- 3. Furthering economic, educational, and social policies that impact opportunity, societal cohesion, and engagement. The policy environment plays a critical role in both problems and solutions. This research theme

addresses a wide range of policy analyses including the impact of financial and economic policies on economic opportunity, the social and cultural context of science and technology, the effectiveness of educational pedagogy and technology in economic advancement, the impact of corporate structures and behaviors on societal well-being, the flow of information, and the ways in which historical and global perspectives shape views on contemporary issues.

4. **Improving formal and informal education throughout the lifespan.** Research in this area focuses on identifying variables that impact student outcomes, developing theories that explain learning principles, investigating interventions (e.g., curriculum, technology, practices) in educational settings, and developing and exploring methods of teaching that are responsive to cultural, linguistic, and other individual differences. This area of inquiry includes every aspect of the human lifespan from early childhood through K-12 schooling, higher education, career, and retirement—and the many different modes of delivery and styles of learning people require throughout their lives to fulfill their personal and professional goals.