ADA-PARC

Scorecard Information

Updated Mar 6, 2025

Theory & Process

Data Source

Where is the data coming from?

Data used for the development of ADA-PARC scorecards derives from the U.S. Census - American Community Survey (ACS) year 2023.

Why Scorecards?

Purpose of ADA-PARC Scorecard development is to translate raw measures into easily interpretable and comparable indices of quality of life for the disabled population.Essentially what we are doing is evaluating, for each individual measure, how the disabled population in state X fares relative to the disabled population of the median state on that measure. An example of this would be the percentage of people with disabilities living below the poverty line in Illinois compared to the percentage of people with disabilities living below poverty in the median state on this metric.

Calculating Scores

So then how are raw values such as % living below the poverty line converted to a 100 point scale?

Step 1: Z-Score

First, we calculate the z-score for each state on every measure. Note: Z-scores are clipped between -3 and 3, and reversed if a higher score on an individual measure is undesirable (e.g. % below poverty). This allows us to keep a consistent scale such that for our final 100 point scores, 0 is the worst and 100 is the best.

Step 1

Raw Measure ----------------------> Z-Score

Step 2: Normalize

In order to convert z-scores scaled from -3 to 3 into a 100 point scale we use a mathematical transformation.

$$50/3z + 50$$

Step 3: Indices

Many of our individual scorecard measures are then grouped together into indices which give insight into broader categories.

Scores Calculation : Example

State Name	Raw Score	Z-Score	100pt Score
-	pwd_home_pct	z_pwd_home_pct	100pt_pwd_home
Pretendland	98%	2	**85**

Interpretation

For the purpose of interpretation of any tables and visual elements as part of the ADA-PARC scorecards, the following rules always apply:

- **Higher #: Better outcomes for people with disabilities**
- **Higher #: Represented by darker color**

Positive Indicator Example

State Name	Raw Score	Z-Score	100pt Score
-	pwd_median_income	z_pwd_median_income	Median income Score
Vermont	$23,809	-1.26	**33**
Hawaii	$37,779	2.09	**76**

> **In this condensed table, two states are displayed to highlight how scores are developed and can be compared**

- In Hawaii, the median income for the disabled population is $37,779 significantly better than average, thus corresponding to a z-score of +2.09 and a 100pt score of 76.
- In Vermont, the median income for the disabled population is $23,809 which is worse than average, thus corresponding to a z-score of -1.26 and a 100pt score of 33.

Negative Indicator Example

State Name	Raw Score	Z-Score	100pt Score
-	pwd_below_poverty_pct	z_pwd_below_poverty	100pt_pwd_below..
Utah	18.06	1.52..	**69**
Kentucky	30.83	-1.09..	**36**

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- 18% of the disabled population lives in Utah lives in poverty, since this is significantly better than average, Utah ends up with a positive z-score, and thus a 100pt score above 50.
- 30% of the disabled population in Kentucky lives in poverty, this is worse than average, corresponding to a z-score of -1.09, thus Kentucky has a 100pt score below 50.

Quartiles

For an added layer of nuance, quartiles are also available to compare states.

Q4 = Best Scores : Top 25% of states

Q3 = Above Average Scores: Top 50% of states

Q2 = Below Average Scores: Bottom 50% of states

Q1 = Worst Scores: Bottom 25% of states

Scorecard Categories

For this process, scores were calculated for each of our three categories of focus in ADA-PARC: Community Living, Community Participation, Work Economic.

Community Living

Measures in this category are related to the living situation of the disabled population for each state.

Indices in Community Living Scorecard

Name of Index	Variable 1	Variable 2	Variable 3
Living in Community Score	PWD % Living at Home	PWD % Living in Nursing Homes	PWD % Living in Institution
Affordable Housing Score	PWD % in Public Housing	PWD % Receive Housing Voucher	-

Measures in Community Living Scorecard

- Home : % of disabled population living at home.
- Nursing Home % of disabled population % of disabled population age 18-64 living in nursing home.
- Institutionalized Group Quarters: % of disabled population living in institutionalized group quarters.
- Non-Institutionalized Group Quarters % of disabled population living in non-institutionalized group quarters.
- Public Housing: % of disabled population living in public housing.
- Housing Choice Voucher: % of disabled population using housing choice voucher.
- Correctional Facility: % of disabled population in a correctional facility.

Community Participation

Measures in this category are related to means through which the disabled population is empowered to participate in society.

Indices in Community Participation Scorecard

Name of Index	Variable 1	Variable 2	Variable 3
Tech Access Score	PWD % Access to Computer	PWD % Access to Smartphone	PWD % Access to Internet
Insurance Access Score	PWD % Public Insurance	PWD % Uninsured	PWD % Private Insurance
Education Access Score	PWD % Less Than High School	PWD % High School Equivaleny	PWD % Bachelors Degree
Transportation Score	PWD % Commute to work by Public Transit	PWD % Commute to Work by Car Alone	-

Measures in Community Participation Scorecard

- Uninsured Age 19-64: % of disabled population age 19-64 without health insurance.
- Public Insurance: % of disabled population with public health insurance.
- Private Insurance Age 19-64: % of disabled population age 19-64 with private health insurance.
- Private Insurance Age 65+: % of disabled population age 65+ with private insurance.
- Commute Public Transportation: % of working disabled population commuting by public transportation.
- Commute Car Alone: % of working disabled population commuting by car alone.
- Less Than High School: % of disabled population age 25+ with less than a high school education.
- High School Equivalent: % of disabled population age 25+ with a high school equivalent education.
- Associates Degree: % of disabled population age 25+ with an associates degree or higher level of education.
- Bachelors Degree: % of disabled population age 25+ with a bachelors degree

- Computer Access: % of disabled population with access to a computer.
- Internet Access: % of disabled population with internet access.
- Smartphone Access: % of disabled population with smartphone access.

Work Economic

Measures in this category are related to labor force characteristics of the disabled population.

Indices in Work Economic Scorecard

Name of Index	Variable 1	Variable 2
Employment and Income	PWD % Employed	PWD Median Income
Poverty and Lack of Work	PWD % Below Poverty	PWD % Not in Labor Force

Measures in Work Economic Scorecard

- Below Poverty: % of Disabled Population living below poverty line.
- Employment: % of working age Disabled Population that is employed.
- Unemployment % of working age Disabled Population that is unemployed.
- Median Income: median individual income for working age disabled population.
- Not In Labor Force: % of working age disabled population not in the labor force

Contact Information

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