Developing a Resilience Strategy
And Using a Resilience Index

This Quickstart Guide is a companion document to the digital version (in Excel) of a self-directed workbook that you can use to develop a resilience strategy for your community, municipality or region.

A key part of this workbook is the development of a "resilience index".
This is a way for you to identify and track your resilience-building efforts against your baseline (where you're starting from), other comparator communities, the province as a whole or even the nation as a whole. The index uses indicators that research suggests are the most important determinants of the ability to reduce the immediate impact of a shock (whether from economic disruption, natural disasters or other shocks), recover from it quickly and adapt to new circumstances.

The workbook suggests specific questions for you --- and perhaps others in your organization --- to consider as you decide what matters most to you in terms of resilience. It also and includes a 'drag and drop' chart so you can capture all the relevant information about your resilience strategy (your baseline, whatever comparators you might choose, and your target for the years ahead) The charts provide helpful advice regarding where to find the data you need to assess your current situation and your plans for the future.

This work was undertaken through an Ontario Labour Market Partnership agreement (OLMP) and associated funding from the Ontario Ministry of Labour, Training, Immigration and Skills Development (2020-2022). For information on other aspects of the project included economic modelling of the impacts of the COVID-19 pandemic and multiple analyses specifically related to resilience. Much of this information is available for third party use under Creative Commons licensing as long as credit is given to the EOLC and the Ministry for their efforts. Additional information is available at www.eolc.info under the Workforce Development and Deployment Working Group page.

For all enquiries, please email the EOLC Project Coordinator contact@eolc.info.

Eastern Ontario's Leadership Council Economic Development

Developing a Resilience Strategy and Using a Resilience Index

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Start here (the Resilience Goals tab: download your free copy of the Workbook from the EOLC website and start on the Resilience Goals tab in your digital workbook. Keep this Quickstart guide close at hand as you begin to ask questions. Some of the charts may contain examples of data that you might put into the workbook but these examples can be easily overwritten so you can customize your work.

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Identifying Our Resilience Goals

Q1. What Aspects of Resilience Are Most (or Least) Important to Our Community/Region?

(no priority implied by order presented; allocate 80 points to the following goals of a resilience strategy)

	Aspect of Resilience	Points	Percentage of Total
A	*Avoid* shocks as much as possible	4	7.7
B	Better *anticipate* and prepare for shocks	7	13.5
C	Lessen *severity* of shocks (blunt the impact)	8	15.4
D	Lessen *duration* of shocks (bounce back faster)	7	13.5
E	Move to *higher level of performance* after recovery	8	15.4
F	*Survival* (keep businesses, organizations "alive")	8	15.4
G	Take opportunity to *leapfrog* ahead	6	11.5
H	Other_____	4	7.7
Total		52	100

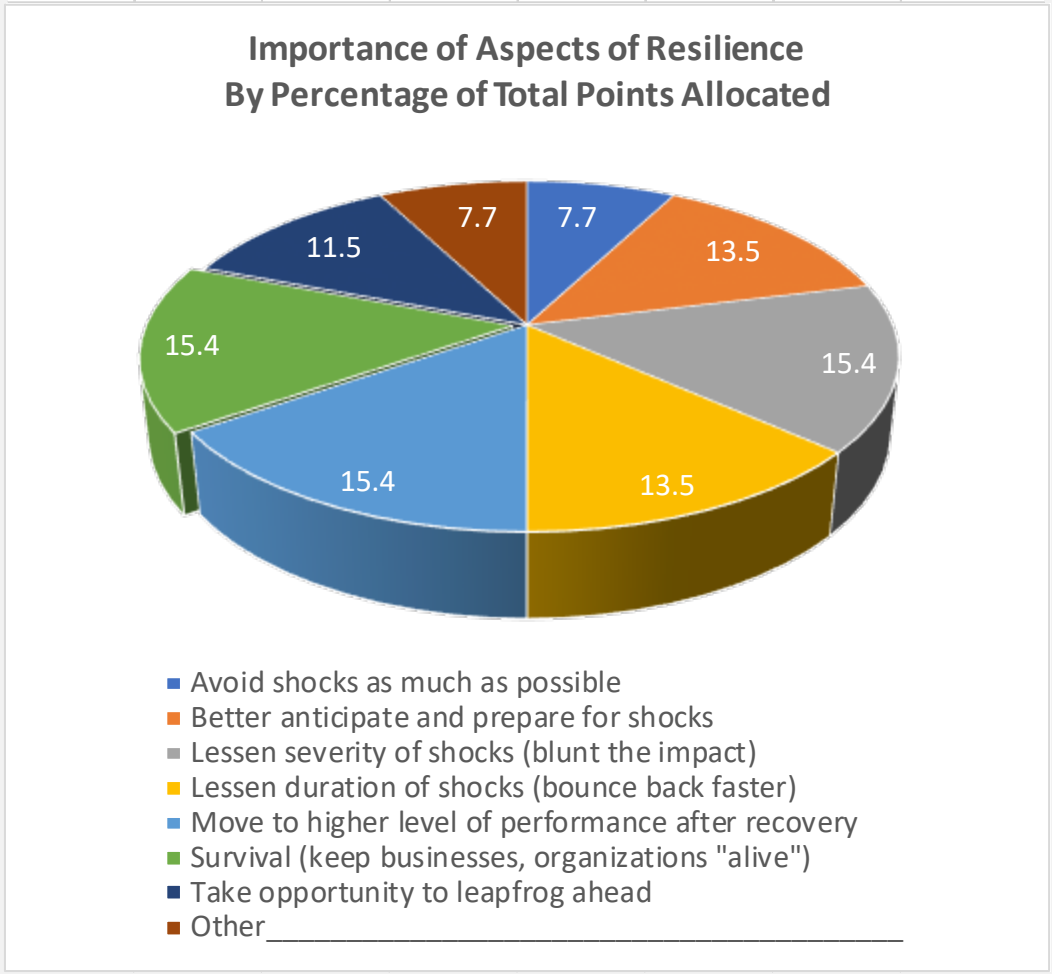
Totals should not exceed 80

Please complete only the Points column; the percentages will calculate automatically

These numbers are just for illustration. In the digital workbook, you can insert your own assessment numbers.

(write in your preference)

This graph is automatically generated when you enter your numbers for Question 1.



The pie chart above is automatically generated based on your responses to the first question.

Now go to the Types of Shocks tab. Consider the types of shocks to which you are most concerned about building resilience. Summarize your thinking in the chart below….

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Prioritizing Types of Shocks for Resilience Purposes

Q2. To What Types of Shocks Do We Want to Develop or Improve Resilience?

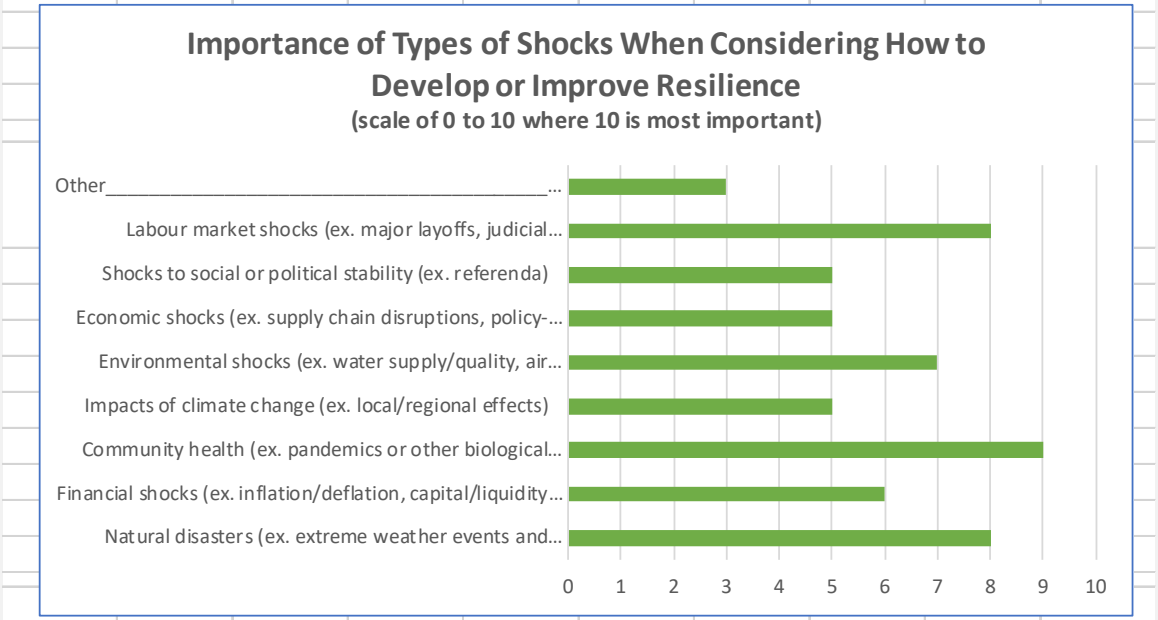
(Assign a number to the importance of each shock in terms of addressing it with the Resilience Thinking. Enter zero "0" for any type of shock you do not to include it in resilience analysis; enter 10 if the shock is of the highest importance for including in resilience analysis.)

	Type of Shock	Enter number 0 to 10 for each type of shock	
A	Natural disasters (ex. extreme weather events and aftermath)	8	
B	Financial shocks (ex. inflation/deflation, capital/liquidity crises)	6	
C	Community health (ex. pandemics or other biological agents)	9	
D	Impacts of climate change (ex. local/regional effects)	5	
E	Environmental shocks (ex. water supply/quality, air quality, biodiversity)	7	
F	Economic shocks (ex. supply chain disruptions, policy-driven impacts)	5	
G	Shocks to social or political stability (ex. referenda)	5	
H	Labour market shocks (ex. major layoffs, judicial decisions)	8	
H	Other_____	3	(write in your preference)
	Total	41	Maximum = 90

These numbers are just for illustration. In the digital workbook, you can insert your own assessment numbers.

….to the Phases of Recovery and Resilience tab.

This graph is automatically generated when you enter your numbers for Question 2.



Q3. Which Phase(s) of Shock and Recovery Do We Want to Include In Resilience Planning?

(no priority implied by order presented; check yes/no based on your organization's/community's priorities)

	Stage of Resilience	Check yes if applicable
A	Anticipation/ability for foresee shocks	
B	Planning/being prepared	
C	Absorption of immediate impact	
D	Recovery from immediate impact	
E	Adaptation to new circumstances	
F	Learning and adjusting resilience processes	
G	Thriving in new circumstances	
H	Other_____	(write in your preference)

Deciding what stage(s) of resilience we want to include in our planning can help us choose the ways we measure progress in building resilience economies, labour markets and communities. allocate our time and other resources. Looking at the stages of resilience can also help us allocate our time and other resources to taking actions that will lead to achieving our resilience goals.

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The Phases of A Shock and Recovery That Resilience Thinking Could Influence

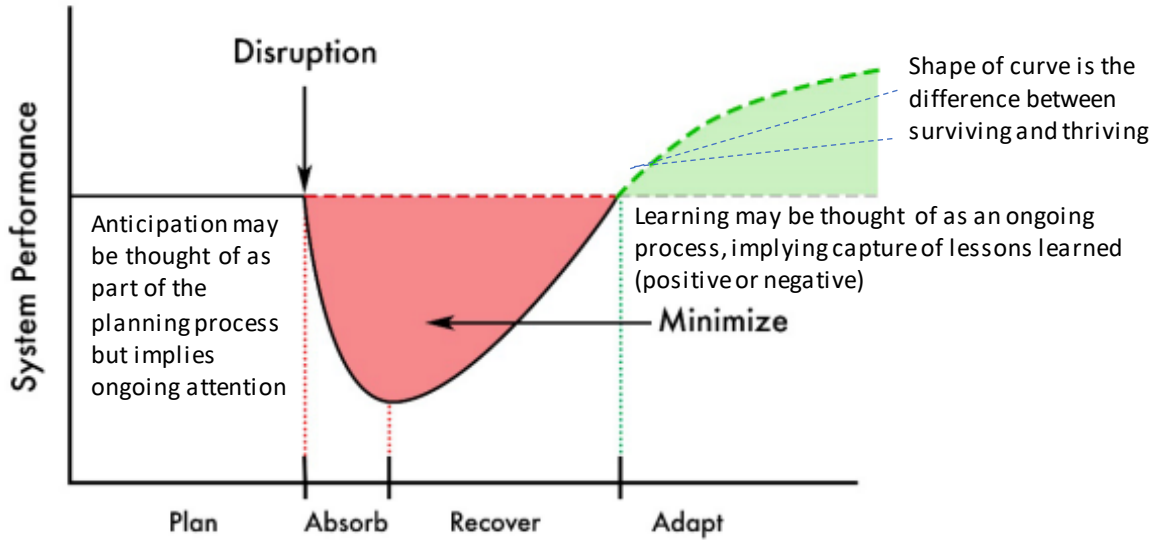

Figure 4: A broad understanding of disruption and resilience encompasses the full temporal dynamics of shock and recovery, and should consider the ability to anticipate, prepare for, mitigate, bounce back — and learn and improve —from economic shocks and disruptions. (Linkov, Trump, & Hynes, 2019)

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Prioritizing Types of Shocks for Resilience Purposes

Q2. To What Types of Shocks Do We Want to Develop or Improve Resilience?

(Assign a number to the importance of each shock in terms of addressing it with the Resilience Thinking. Enter zero "0" for any type of shock you do not to include it in resilience analysis; enter 10 if the shock is of the highest importance for including in resilience analysis.)

	Type of Shock	Enter number 0 to 10 for each type of shock	
A	Natural disasters (ex. extreme weather events and aftermath)	8	
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G	Shocks to social or political stability (ex. referenda)	5	
H	Labour market shocks (ex. major layoffs, judicial decisions)	8	
H	Other_____	3	(write in your preference)
	Total	41	Maximum = 90

These numbers are just for illustration. In the digital workbook, you can insert your own assessment numbers.

This tab provides an opportunity for focus on the types of shocks of greatest interest and/or concern. The digital version of the workbook (see tab Phases of Recovery and Resilience) includes some sample numbers that you can easily delete and enter your own values.

Take a moment to consider which of the phases of an economic shock you want to focus in on developing your own resilience strategy.

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Identifying Shock Phases for Focusing Resilience Thinking

Q3. Which Phase(s) of Shock and Recovery Do We Want to Include In Resilience Planning?

(no priority implied by order presented; check yes/no based on your organization's/community's priorities)

	Stage of Resilience	Check yes if applicable
A	Anticipation/ability for foresee shocks	
B	Planning/being prepared	
C	Absorption of immediate impact	
D	Recovery from immediate impact	
E	Adaptation to new circumstances	
F	Learning and adjusting resilience processes	
G	Thriving in new circumstances	
H	Other_____	(write in your preference)

Deciding what stage(s) of resilience we want to include in our planning can help us choose the ways we measure progress in building resilience economies, labour markets and communities. allocate our time and other resources. Looking at the stages of resilience can also help us allocate our time and other resources to taking actions that will lead to achieving our resilience goals.

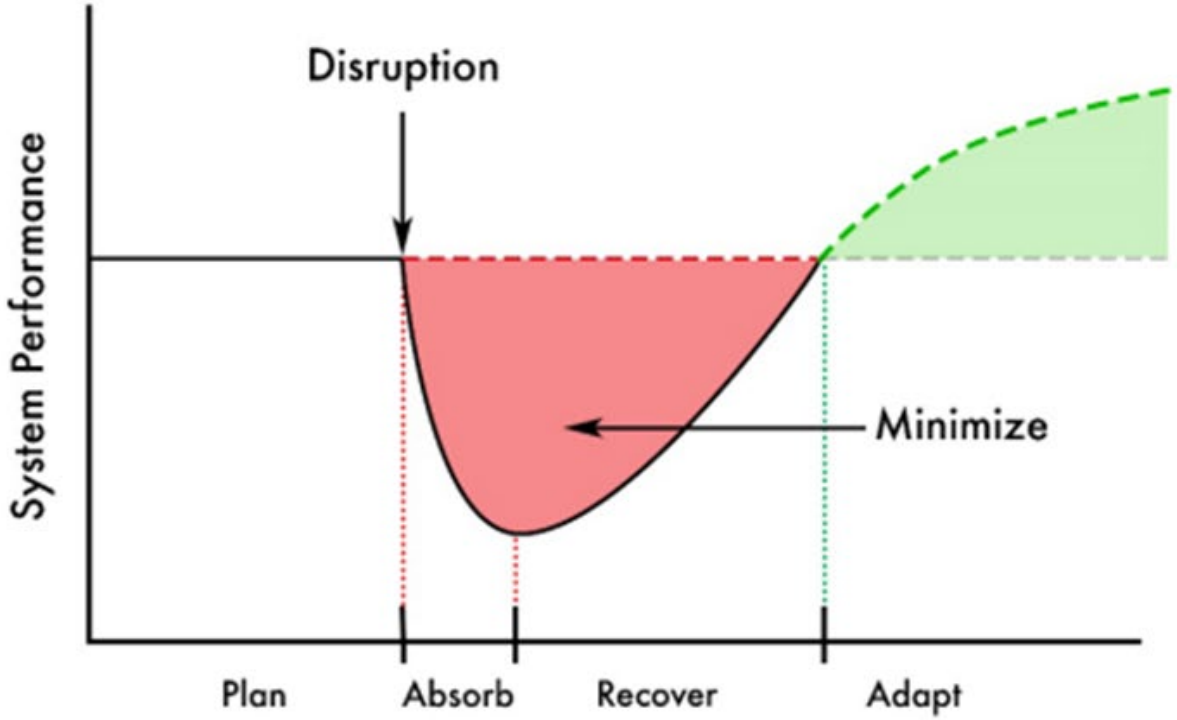

Figure 4: A broad understanding of disruption and resilience encompasses the full temporal dynamics of shock and recovery, and should consider the ability to anticipate, prepare for, mitigate, bounce back — and learn and improve —from economic shocks and disruptions. (Linkov, Trump, & Hynes, 2019)

Now proceed to the Measuring or Comparing Tab and consider the types of measures and comparator jurisdictions (if any) that you would like to use to assess your progress. You can overwrite the ratings that are shown on the worksheet; they are just examples.

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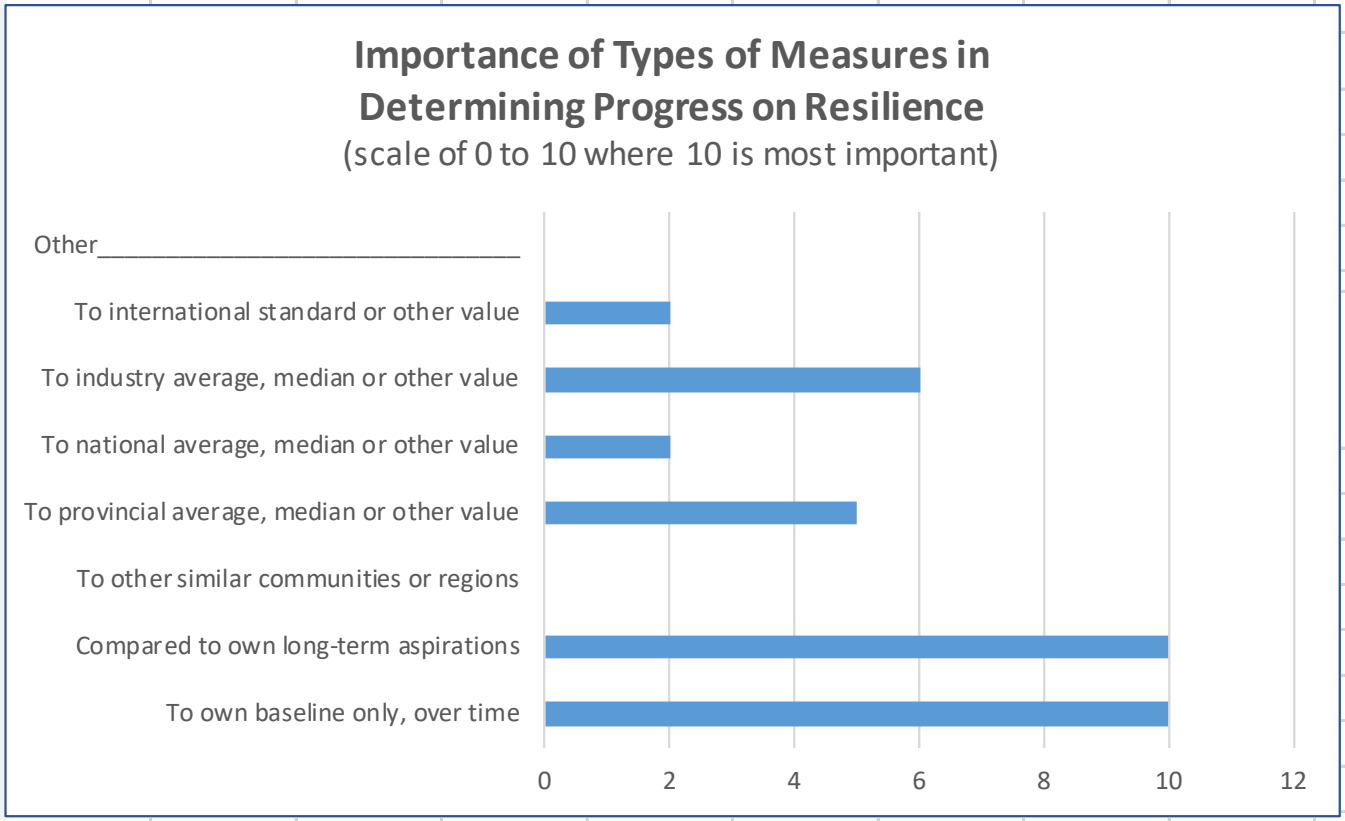
Q4. What Types of Measures Will We Use to Determine If We're Making Progress on Resilience?

(Assign a number to the importance of each standard in terms of using it as way to measure development of Resilience in your community or region Enter zero "0" for any type of measurement or comparator you do not want to use in resilience analysis; enter 10 if the measurement or comparator is of the highest importance for use in resilience analysis.)

	Type of Measure	Enter number 0 to 10 for each type of measure	
A	To own baseline only, over time	10	
B	Compared to own long-term aspirations	10	
C	To other similar communities or regions	0	
D	To provincial average, median or other value	5	
E	To national average, median or other value	2	
F	To industry average, median or other value	6	
G	To international standard or other value	2	
H	Other_____	0	(write in your preference)
	Total	35	Maximum = 80

These numbers are just for illustration. In the digital workbook, you can insert your own assessment numbers. The total will be calculated automatically.

This graph is automatically generated when you enter your numbers for Question 4.



The Recommended Indicators tab sets out the 15 indicators that research indicates are important factors --- perhaps the most important ones --- in conferring resilience. Each one is defined to help you understand what you're measuring and why. Some are qualitative assessments for which you and/or your colleagues will need to make a judgement call.

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Q5. Do the Recommended Indicators Work for Our Community or Region?

Indicator Category		Recommended Indicator
Governance & Leadership	1	**Anticipation Capacity**
Definition/Description		(Five factor aggregate; access to data; forecasting capability; infrastructure planning; finance rating and/or stress test; storage capacity and/or supply chain redundancy)
Governance & Leadership	2	**Digital Connectivity**
Definition/Description		(Proportion of geographic area served by 50/10 broadband)
Governance & Leadership	3	**Governance Processes**
Definition/Description		(Five factor aggregate: Speed of response to shocks; provincial-federal collaborations; percentage of citizens voting; resilience strategy in place; relief funds available)
Governance & Leadership	4	**Financlal Capacity**
Definition/Description		(Dollar value of municipal reserves in relation to total operating budget)
Economic/Sector	5	**Economic Structure**
Definition/Description		(Number of sectors with at least 5 per cent of the total labour force)
Economic/Sector	6	**Local/Regional Production Capacity**
Definition/Description		(Percentage of total EXPORTS in agriculture, manufacturing, forestry, mining)
Economic/Sector	7	**Entrepreneurship and Small Business**
Definition/Description		(Percentage of small businesses compared to total employment locations)
Economic and Social Vulnerability	8	**Demographics - Aging**
Definition/Description		(Percentage of population 65 years of age or older)
Economic and Social Vulnerability	9	**Demographics - Affordability**
Definition/Description		(Average sales prices of a home/Mean annual household income)
Economic and Social Vulnerability	10	**Community Well-being**
Definition/Description		(Five factor aggregate - prevalence of NFPs & service clubs, availability of social services, primary care physician coverage, food bank(s), prevalence of homelessness)
Labour Market	11	**Labour Force Engagement**
Definition/Description		(Percentage of persons aged 15 to 64 years as share of total population)
Labour Market	12	**Labour Force Mobility**
Definition/Description		(Percentage of population that had moved within the past year --- place of residence)
Labour Market	13	**Workforce Near Retirement**
Definition/Description		(Percentage of 55-64 Age Group As Share of Working Age Population)
Labour Market	14	**Education & Skills Attainment**
Definition/Description		(Use Percentage of Population 15 Years and Over without a certificate, diploma or degree; instead of Mean number of years of schooling)
Innovation	15	**Innovation Capacity**
Definition/Description		(Five factor aggregate - presence of local/regional incubators and/or prototyping services, Intellectual Property guidance, angel investors and/or tech startup funding; business development supports; research-intensive colleges or universities;

While research and case studies suggested the preceding 15 indictors, the specific circumstances of your community or region may prompt you to include slightly different indicators. Some examples are shown below. Whatever your decision, make sure you don't take expand your list too much. It may mean a lot more work finding the data you'll use to evaluate your progress going forward.

Indicator Category	OTHER FACTORS THAT COULD BE TAKEN INTO ACCOUNT
	IF YOU ADD AN INDICATOR TO THE ABOVE RECOMMENDED LIST, TAKE ONE OF THEM OFF)
Economic and Social Vulnerability	**Percentage of Occupied Private Dwellings with Major Repairs Needed**
Definition/Description	(Number of households needing major repair/Total number of households)
Economic and Social Vulnerability	**Percentage of Tenants Spending 30% or More of Income on Shelter Costs**
Definition/Description	(Non-reserve, non-farm private dwellings)
Economic and Social Vulnerability	**Prevalence of Low Income Population**
Definition/Description	(Percentage of Population based on Low-income measure after-tax;
	add all age groups together: 0-17; 18-64; 65 and over)
Labour Market	**Worked at Home (Before the Shock)**
Definition/Description	(For Employed Labour Force Aged 15 years and over)
Labour Market	**Core Buffer Industry Concentration**
Definition/Description	(Percentage of total **employment** in construction, healthcare, public administration and agriculture)
Labour Market	**Recruitment Intensity**
Definition/Description	Job Postings Intensity (Number of Postings "Locations"/Unique Posting)
Labour Market	**Relative Unemployment Rate**
Definition/Description	(Local unemployment rate compared to provincial average)

Data Consolidation – Indicators: Once you are familiar with the specific indicators you want to use in your resilience strategy, it's time to pull together the data and the information you will use to establish your starting point --- your baseline. The Data Consolidation – Indicators tab lays out the indicators and suggests where to find the data to use for your first assessment. As is shown on the following 10 pages, this tab is action central for your data-gathering and the worksheet is quite wide. Just keep scrolling to the right and you "fill In the blanks". Several of the indicators are totals of five qualitative assessments you'll make; the total "score" will be tabulated automatically and will show up in the yellow cells. Use the space below the charts to make notes on who might have the data you're looking for or where you might find it in your own organization.

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You assess each of the five factors below and assign a maximum score of two points. When you enter your score, it will automatically total up in the yellow cell.

Geographic Area	1. Indicator: Anticipation Capacity					
Census Subdivision (note: this column is "frozen" so that you can keep your CSD in view as you scroll back and forth, right to left)	**Access to Data (2 pts)**	**Forecasting Capability (2 pts)**	**Infrastructure Planning (2 pts)**	**Finance Rating and/Or Stress Test (2 pts)**	**Storage Capacity And/Or Supply Chain Redundancy (2 pts)**	**Total - Anticipation Capacity (out of 10)**
Where do you find the data?	Local assessment	Local assessment	Municipal government	Municipal government (Credit score or Financial Information Return)	Local assessment (start with your Economic Development Office)	**This indicator autocalculates (below) once you input values into cells B5 to F5**
[enter your CSD name here]	0	0	0	0	0	0
Possible Comparators						
Eastern Ontario						
ONTARIO						
CANADA						

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You assess each of the five factors below and assign a maximum score of two points. When you enter your score, it will automatically total up in the yellow cell.

(year?) means what year is the data from?

Geographic Area	2. Indicator: Digital Connectivity	3. Indicator: Governance Processes					
Census Subdivision (note: this column is "frozen" so that you can keep your CSD in view as you scroll back and forth, right to left)	**Digital Connectivity (% of Area Served by 50/10 down/up) (year?)**	**Speed of Responsive To Shocks (2 pts)**	**Provincial-Federal Government Collaborations (2 pts)**	**Citizens Voting (2 pts)**	**Resilience Srategy (2 pts)**	**Relief Funds (2 pts)**	**Total - Governance Processes (out of 10)**
Where do you find the data? →	Municipal government and/or regional broadband organizations and/or local ISPs	Municipal government and/or Emergency Services organizations and/or local Not for Profits and Service Clubs	Municipal government and/or regional offices of provincial or federal departments	Municipal government electoral records (percentage of eligible voters)	Municipal government (do you have one?)	May be a combination of local, provincial or federal	**This indicator autocalculates (below) once you input values into cells K5 to O5**
[enter your CSD name here]		0	0	0	0	0	0
Possible Comparators							
Eastern Ontario							
ONTARIO							
CANADA							

	Eastern Ontario's Leadership Council Economic Development						
		(year?) means what year is the data from?				**(year?)** means what year is the data from?	
	Geographic Area	**4. Indicator: Financial Capacity**				**5. Indicator: Economic Structure**	
	Census Subdivision (note: this column is "frozen" so that you can keep your CSD in view as you scroll back and forth, right to left)	**Dollar Value of Municipal Reserves (year?)**	**Total Operating Budget (Year?)**	**Dollar value of municipal reserves in relation to total operating budget (year?)**		**Total Labour Force (#) (year?)**	**Number of economic sectors with at least 5% of the total labour force (year?)**
	Where do you find the data? →	Municipal government (Financial Information Return)	Municipal government (Financial Information Return)	**This indicator autocalculates (below) once you input values into cells S5 to T5**		2021 census for your municipality or from EMSI Analyst	2021 census for your municipality or from EMSI Analyst
	[enter your CSD name here]			#DIV/0!			
	Possible Comparators						
	Eastern Ontario						
	ONTARIO						
	CANADA						

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(year?) means what year is the data from?

Geographic Area	6. Indicator: Local/Regional Production Capacity				
Census Subdivision (note: this column is "frozen" so that you can keep your CSD in view as you scroll back and forth, right to left)	**Total EXPORTS in Agriculture & Forestry, Fishing & Hunting (year?)**	**Total EXPORTS In Manufacturing (year?)**	**Total EXPORTS in Mining, Quarrying, Oil & Gas (year?)**	**Total EXPORTS in All Sectors (year?)**	**Percentage of Total EXPORTS in Agricuture, Manufacturing, Forestry, Mining (year?)**
Where do you find the data? →	EMSI Analyst - Select Industries and generate Exports table; choose 2-digit at top left hand corner; enter dollar value of exports (11)	EMSI Analyst - Select Industries and generate Exports table; choose 2-digit at top left hand corner; enter dollar value of exports (31-33)	EMSI Analyst - Select Industries and generate Exports table; choose 2-digit at top left hand corner; enter dollar value of exports (21)	EMSI Analyst - Select Industries and generate Exports table; enter unlabelled totat at bottom of exports column	**This indicator autocalculates (below) once you input values into cells Z5 to AC5**
[enter your CSD name here]					#DIV/0!
Possible Comparators					
Eastern Ontario					
ONTARIO					
CANADA					

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(year?) means what year is the data from?

Geographic Area	7. Indicator: Entrepreneurship and Small Business		
Census Subdivision (note: this column is "frozen" so that you can keep your CSD in view as you scroll back and forth, right to left)	**Number of Small Business Employment Locations (excluding indeterminates) (year?)**	**Total Number of Employment Locations (excluding indeterminates) (year?)**	**Percentage of Small Businesses Compared to Total Employment Locations (year?)**
Where do you find the data? →	EMSI Analyst	EMSI Analyst	**This indicator autocalculates (below) once you input values into cells AC5 to AD5**
[enter your CSD name here]			#DIV/0!
Possible Comparators			
Eastern Ontario			
ONTARIO			
CANADA			

	Eastern Ontario's Leadership Council Economic Development							
		(year?) means what year is the data from?				**(year?)** means what year is the data from?		
	Geographic Area	**8. Indicator: Demographics - Aging**				**9. Indicator: Demographics - Affordability**		
	Census Subdivision (note: this column is "frozen" so that you can keep your CSD in view as you scroll back and forth, right to left)	**Population Age 65 Years or Older (Year: 2021)**	**Total Population (Year: 2021)**	**Percentage of Population 65 Years of Age Or Older**		**Average Sales Price of a Home (month/year?)**	**Median Annual Household Income - After Tax (year?)**	**Average Sales Price of a Home/Mean Annual Household Income**
	Where do you find the data? →	2021 census for your municipality	2021 census for your municipality	**This indicator autocalculates (below) once you input values into cells AG5 and AH5**		CREA website National Price Map https://www.crea.ca/housing-market-stats/national-price-map/	2021 census for your municipality (may have to use 2016 until 2021 results are available)	**This indicator autocalculates (below) once you input values into cells AK5 and AL5**
	[enter your CSD name here]			#DIV/0!				#DIV/0!

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You assess each of the five factors below and assign a maximum score of two points. When you enter your score, it will automatically total up in the yellow cell.

(year?) means what year is the data from?

Geographic Area	10. Indicator: Community Well-Being					
Census Subdivision (note: this column is "frozen" so that you can keep your CSD in view as you scroll back and forth, right to left)	**Prevaluence of NFPs & Service Clubs (2 pts)**	**Availablity of Social Services (2 pts)**	**Primary Care Physician Coverage (2 pts)**	**Food Bank(s) (2 pts)**	**Prevalence of Homelessness (2 pts)**	**Total Community Well-Being (out of 10)**
Where do you find the data? →	Municipal government and/or Emergency Services organizations and/or local Not for Profits and Service Clubs	Municipal government and/or Emergency Services organizations and/or local Not for Profits and Service Clubs	Should be available from provincial Ministry of Health	Local stakeholders including farm organizations should know	Designated municipal governments as well as local housing groups	**This indicator autocalculates (below) once you input values into cells AO5 to AS5**
[enter your CSD name here]	0	0	0	0	0	0

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(year?) means what year is the data from?

(year?) means what year is the data from?

Geographic Area	11. Indicator: Labour Force Engagement			12. Indicator: Labour Force Mobility		
Census Subdivision (note: this column is "frozen" so that you can keep your CSD in view as you scroll back and forth, right to left)	**Number of Persons 15-64 (Year: 2021)**	**Total Population (Year: 2021)**	**Percentage of Population in Core Workforce Age (%)**	**Number of Persons Moved within Past Year (year?)**	**Total Population (year?)**	**Percentage of Population Moved in Past Year (year?)**
Where do you find the data? →	2021 census for your municipality or from EMSI Analyst	2021 census for your municipality or from EMSI Analyst	**This indicator autocalculates (below) once you input values into cells AV5 and AW5**	2021 census for your municipality	2021 census for your municipality or from EMSI Analyst	**This indicator autocalculates (below) once you input values into cells AZ5 and BA5**
[enter your CSD name here]			#DIV/0!		0	#DIV/0!

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(year?) means what year is the data from?

(year?) means what year is the data from?

Geographic Area	13. Indicator: Workforce Near Retirement			14. Indicator: Education and Skills Attainment		
Census Subdivision (note: this column is "frozen" so that you can keep your CSD in view as you scroll back and forth, right to left)	**Number of Persons 55-64 (Year: 2021)**	**Total Population (Year: 2021)**	**Percentage of Population Near Retirement (year?)**	**Number of Persons Aged 15 and Over Without Certificate, Diploma or Degree (year?)**	**Number of Persons Age 15 or Older (year?)**	**Percentage of Population Without Certificate, Diploma or Degree (year?)**
Where do you find the data? →	2021 census for your municipality	2021 census for your municipality or from EMSI Analyst	**This indicator autocalculates (below) once you input values into cells BD5 and BE5**	2021 census for your municipality	2021 census for your municipality	**This indicator autocalculates (below) once you input values into cells BH5 and BI5**
[enter your CSD name here]		0	#DIV/0!			**#DIV/0!**

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You assess each of the five factors below and assign a maximum score of two points. When you enter your score, it will automatically total up in the yellow cell.

Geographic Area	15. Indicator: Innovation Capacity					
Census Subdivision (note: this column is "frozen" so that you can keep your CSD in view as you scroll back and forth, right to left)	**Presence of Incubators**	**Available Guidance Re: Intellectual Property**	**Presence of Angel Investors/Startup Funding**	**Research-Intensive Colleges or Universities**	**Local/Regional Prototyping Services**	**Total Innovation Capacity (out of 10)**
Where do you find the data? →	Local assessment (start with your Economic Development Office)	Local assessment (start with your Economic Development Office)	Local assessment (start with your Economic Development Office)	Local assessment (start with your Economic Development Office… and your local PSE campuses)	Local assessment (start with your Economic Development Office… and your local PSE campuses)	**This indicator autocalculates (below) once you input values into cells BL5 to BP5**
[enter your CSD name here]	0	0	0	0	0	0

Baseline and Targets Tab: Once you've gathered your baseline information, it's time to move over to the Baseline and Targets tab. This is where you will see the information you entered into the preceding worksheet carried forward to the summary page below. The baseline information will be carried into the Baseline, Comparators and Target chart (shown on the following page…)

Eastern Ontario's Leadership Council Economic Development

Qualitative Ratings Plus Quantitative Data

(Bold face below means you must provide the ratings; others are determined by data from other sources)

#	Measure					
		Access to Data (max 2 pts)	Forecasting Capability (max 2 pts)	Inrastructure Planning (max 2 pts)	Finance Rating/ Stress Test (max 2 pts)	Supply Chain Redundancy (2 pts)
1	**Anticipation Capacity**	0	0	0	0	0
2	Digital Connectivity	0				
3	**Governance Processes**	Responsiveness (2 pts)	Prov-Fed Gov (max 2 pts)	Citizens Voting (2 pts)	Resilience Strategy	Relief Funds (2 pts)
		0	0	0	0	0
4	Financial Capacity	$ Reserves ($)	Annual Operating 9$)			
		0	0			
5	Economic Structure	0%				
6	Local/Regional Production Capacity	Agr & Forestry, Fishing & Hunting ($B)	Manufacturing ($B)	ing, Quarrying & Oil &Gas	Total ($B)	
		$ -	$ -	$ -	0%	
7	Entrepreneurship and Small Business	Businesses Under 50 empl (#)	Total Businesses (#)			
		0	0			
8	Demographics - Age	Age 65 or older (#)	Total Population (#)			
		#DIV/0!	0			
9	Demographics Affordability	Average Sales Price ($)	Mean Annual HHLD Inc ($)			
		$ 400,000	$ 57,000			
10	**Community Well-being**	Prevalence of NFP (2 pts)	Avail of Social Services	Primary Care Physicians	Food Banks (2 pts)	Homelessness (2 pts)
		0	0	0	0	0
11	Labour Force Engagement	15-64 Population (#)	Total Population (#)			
		0	0			
12	Labour Force Mobility	Number Moved (#)	Total Population (#)			
		0	0			
13	Workforce Near Retirement	55-64 Population (#)	Total Population (#)			
		0	0			
14	Education and Skills Attainment	15+ with more H/S (#)	Pop 15 and Over (#)			
		0	0			
15	**Innovation Capacity**	Incubators & Proto.(2 pts)	IP Guidance (2 pts)	Angels & Tech $ (2 pts)	Bus Dev Supports (2 pts)	Research PSE (2 pts)
		0	0	0	0	0

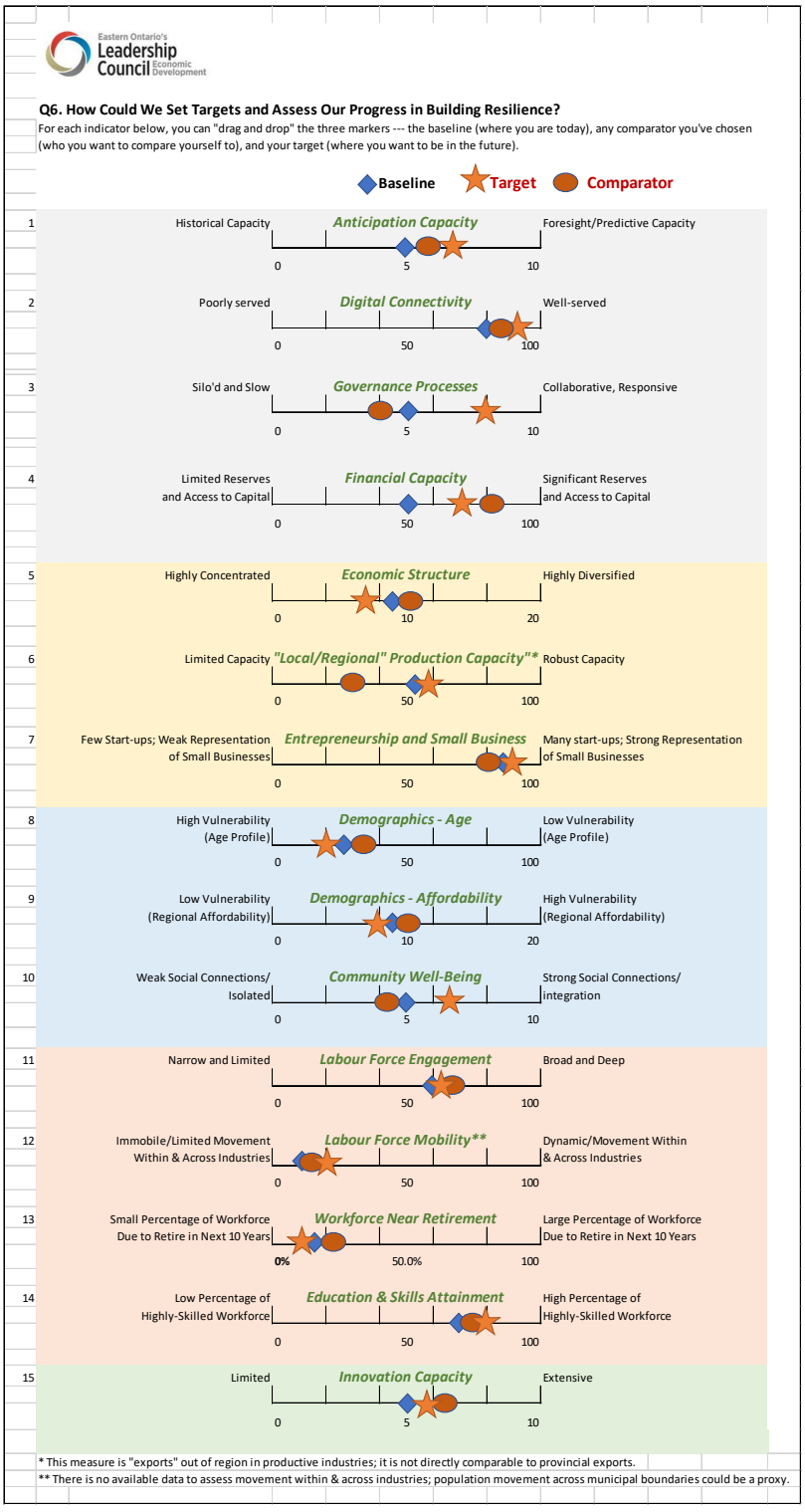
Baseline, Comparators and Target: In this chart, you will have the opportunity to consider what target(s) you want to set for your organization/community for each of the selected indicators. This is where you will consider the relative importance of different aspects of resilience and think about how much you want to 'move the needle' on each one. In effect, this is your one-page summary of the end results you're seeking.

Eastern Ontario's Leadership Council Economic Development

Resilience Indicators - Baseline, Comparators and Target

#	Measure	Type of Indicator	[year] Baseline	[year] Comparator	[year] Target
1	Anticipation Capacity	5 factor aggregate (max score: 10)	0		
2	Digital Connectivity	Percentage of households with 50/10	87.0%		
3	Governance Processes	5 factor aggregate (max score: 10)	0		
4	Financial Capacity	$ municipal reserves/operating budget	#DIV/0!		
5	Economic Structure	# of Sectors with 5% of employment	#REF!	10	
6	Local/Regional Production Capacity	% of **Sales** in 4 sectors	#DIV/0!		
7	Entrepreneurship and Small Business	% of Small Business/All Locations	#DIV/0!		
8	Demographics - Age	% of population 65 years of age or older	#DIV/0!		
9	Demographics Affordability	Ave sales price home/Mean annual hhld	7.0		
10	Community Well-being	5 factor aggregate (max score: 10)	0.0		
11	Labour Force Engagement	% 15-64 of Total Population	#DIV/0!		
12	Labour Force Mobility	% of Population Moved Within Past Year	#DIV/0!		
13	Workforce Near Retirement	% of 55-64 of Working Age Pop	#DIV/0!		
14	Education and Skills Attainment	% of Pop 15 Years and Over with more th	#DIV/0!		
15	Innovation Capacity	5 factor aggregate (max score: 10)	0		

On the **Resilience Index Framework** tab, you can position the icons to show clearly how your organization wants to improve resilience. In the digital workbook. you can “drag and drop” the icons to create a highly visible image of your approach to resilience. The positioning of the icons in the digital workbook is random and is only intended to demonstrate the idea. Once you have the icons positioned to reflect your areas of emphasis, you can “publish” it with team members as an infographic and/or a large wall chart.



Resilience Strategies: Now that the "what" is clear, it's time to make decisions on the "how". For instance, if you want to improve digital connectivity, how might your organization or community do that? If you wanted to improve your financial capacity to weather economic or other storms, how might you get started? On the Resilience Strategies tab, you and your colleagues will have a place to record and prioritize your ideas. You can record both your top strategy to move toward your target as well as a secondary strategy. Once completed, the chart can become a project management tool to help you stay on top of strategy implementation.

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Once you've prioritized any action on each measure, decide what your most important strategy is to move toward your target.

For the same measure, decide what your second most important strategy is to move toward your target.

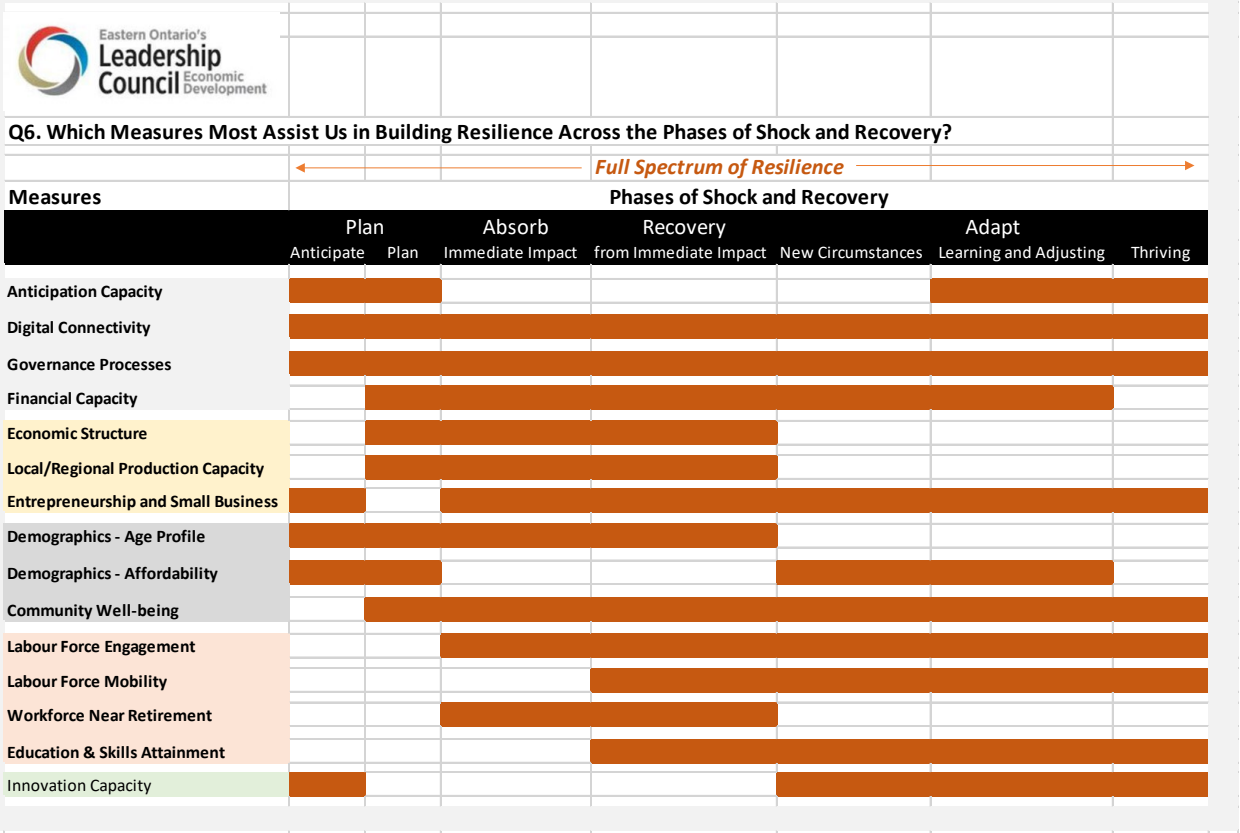
#	Measure	Top Strategy to Move Toward Your Target Considering Whether You are Addressing an Opportunity or a Threat	Secondary Strategy to Move Toward Your Target Considering Whether You are Addressing an Opportunity or a Threat
1	Anticipation Capacity		
2	Digital Connectivity		
3	Governance Processes		
4	Financial Capacity		
5	Economic Structure		
6	Local/Regional Production Capacity		
7	Entrepreneurship and Small Business		
8	Demographics - Age		
9	Demographics - Affordability		
10	Communty Well-being		
11	Labour Force Engagement		
12	Labour Force Mobility		
13	Workforce Near Retirement		
14	Education & Skills Attainment		
15	Innovation Capacity		

The **Summary of Index – Example** and **Summary of Index – Blank** tabs are included only to show how baseline data might be presented. The Summary of Index – Example tab includes actual data for Eastern Ontario and the Province of Ontario, and notes the evidence for selecting these indicators as well as some thoughts on what constitutes "good performance" As always though, the final word remains with stakeholders in individual communities.

Category		Indicator	Local Percentage (2021)	Provincial Percentage (2021)	Ratio
Governance & Leadership	1	**Anticipation Capacity**	Qualitative Assessment		
		(5 factor aggregate; access to data; forecasting capability; infrastructure planning; finance rating and/or stress test; storage capacity and/or supply chain redundancy)			
Governance & Leadership	2	**Digital Connectivity**	72%	87%	0.83
		(Propotion of geographic area served by 50/10 broadband)			
Governance & Leadership	3	**Governance Processes**	Qualitative Assessment		
		(Five factor aggregate: speed of response to shocks; provincial-federal collaborations; percentage of citizens voting; have developed a resilience strateg			
Governance & Leadership	4	**Financial Capacity**	$ 0.03	$ 0.04	
		(Dollar value of municipal reserves in relation to total operating budget)			
Economic/Sector	5	**Economic Structure**	8	10	0.80
		(Number of sectors with at least 5 per cent of the total labour force)			
Economic/Sector	6	**Local/Regional Production Capacity**	56.5	37.2	1.52
		(Percentage of total EXPORTS in agriculture, manufacturing, forestry, mining)			
Economic/Sector	7	**Entrepreneurship and Small Business**	95.9	95.2	1.01
		(Percentage of small businesses compared to total employment locations)			
Economic and Social Vulnerability	8	**Demographics - Aging**	26.5	18.5	1.43
		(Percentage of population 65 years of age or older)			
Economic and Social Vulnerability	9	**Demographics - Affordability**	9.1	10.7	0.85
		(Average sales prices of a home/Mean annual household income)			
Economic and Social Vulnerability	10	**Community Well-being**	Qualitative assessment		
		(5 factor aggregate - prevalence of NFPs & service clubs, availability of social services, primary care physician coverage, food bank(s), prevalence of homelessness)			
Labour Market	11	**Labour Force Engagement**	59.9	65.6	0.91
		(Percentage of persons aged 15 to 64 years as share of total population)			
Labour Market	12	**Labour Force Mobility**	10.9	12.5	0.87
		(Percentage of population that had moved within the past year --- place of residence)			
Labour Market	13	**Workforce Near Retirement**	17.8	13.6	1.30
		(Percentage of 55-64 Age Group As Share of Working Age Population)			
Labour Market	14	**Education & Skills Attainment**	17.8	17.5	1.02
		(Use Percentage of Population 15 Years and Over without a certificate, diploma or degree; instead of Mean number of years of schooling)			
Innovation	15	**Innovation Capacity**	Qualitative Assessment		
		(5 factor aggregate - presence of incubators, IP guidance, angel investors and/or tech startup funding; business development supports; research-intensive colleges or universities; local/regional prototyping services) THIS IS SIX; CHOOSE ONE THAT IS THE LOWEST PRIORITY FOR YOU AND DROP IT			

OTHER FACTORS THAT COULD BE TAKEN INTO ACCOUNT				
Economic and Social Vulnerability	**Percentage of Occupied Private Dwellings with Major Repairs Needed**	7.7	6.1	1.26
	(Number of households needing major repair/Total number of households)			
Economic and Social Vulnerability	**Percentage of Tenants Spending 30% or More of Income on Shelter Costs**	48.5	45.7	1.06
	(Non-reserve, non-farm private dwellings)			
Economic and Social Vulnerability	**Prevalence of Low Income Population**	39.7	27.1	1.46
	(Percentage of Population based on Low-income measure after-tax;			
	add all age groups together: 0-17; 18-64; 65 and over)			
Labour Market	**Worked at Home (Before the Shock)**	8.8	7.3	1.22
	(For Employed Labour Force Aged 15 years and over)			
Labour Market	**Core Buffer Industry Concentration**	33.7	24.5	1.38
	(Percentage of total **employment** in construction, healthcare, public administration and agricultur	31.3	25.8	1.22
Labour Market	**Recruitment Intensity**	2.0	2.0	1.00
	Job Postings Intensity (Number of Postings "Locations"/Unique Posting)			
Labour Market	**Relative Unemployment Rate**	7.7	7.4	1.04
	(Local unemployment rate compared to provincial average)			

Measures – Shock and Recovery: This tab provides another perspective on the indicators, showing how some indicators are more important as anticipatory actions (long before an economic shock hits) and others are important In the recovery or adaptation phase. This perspective is provided just to provide you and your colleagues with the opportunity to think about the full spectrum of possibilities when it comes to planning for resilience.



Consider which of the 15 measures your community or region need to work on in relation to your resilience goals.