NDPBA

PALAU
STATE PROFILES

SUBNATIONAL ASSESSMENT RESULTS
PALAU
AIMELIIK

CAPITAL: MONGAMI
Area: 14 mi²

RISK AND VULNERABILITY COMPONENT SCORE

**MULTI-HAZARD RISK (MHR)** - Low
Score: 0.407 • Rank: 11/16

**RESILIENCE (R)** - High
Score: 0.634 • Rank: 4/16

**MULTI-HAZARD EXPOSURE (MHE)** - Low
Score: 0.489 • Rank: 9/16

**VULNERABILITY (V)** - Very Low
Score: 0.200 • Rank: 13/16

**COPING CAPACITY (CC)** - Low
Score: 0.467 • Rank: 9/16

Population (2020 Census): 363
Poverty: 24.7%
No High School Diploma: 12.9%
Households without Internet: 51.9%
Temporary Structures as Housing: 20.75%
MULTI-HAZARD EXPOSURE (MHE)

RANK: 9 / 16 STATES
SCORE: 0.489

ESTIMATED EXPOSURE TO EACH HAZARD:

Sea Level Rise
- 21.4%
- 78
- $3.85 Million
- Critical Infrastructure Exposed: 25.9%

Tsunami
- 1.2%
- 4
- Critical Infrastructure Exposed: 5.6%

Storm Surge + Sea Level Rise
- 28.1%
- 102
- $3.85 Million
- Critical Infrastructure Exposed: 51.9%

Earthquake
- 0.0%
- 0
- $0
- Critical Infrastructure Exposed: 0.0%

Storm Surge
- 1.2%
- 4
- Critical Infrastructure Exposed: 5.6%

Landslide
- 35.4%
- 128
- $4.44 Million
- Critical Infrastructure Exposed: 46.3%

Tropical Cyclone Wind
- 100%
- 363
- $8.30 Million
- Critical Infrastructure Exposed: 100%
VULNERABILITY (V)

Vulnerability measures the conditions and processes that increase susceptibility of communities and systems to the damaging effects of hazards. Vulnerability in Aimeliik is primarily driven by Housing Characteristics and Household Composition and Disability. The bar charts indicate the socioeconomic themes contributing to the overall Vulnerability score.

Housing Characteristics

- 17.9% Households Using Biomass for Fuel
- 2.8% Households without Electricity
- 36.8% Households without Access to Public Water

Communication Assets

- 4.7% Households without Cell Phone
- 62.3% Households without Computer
- 51.9% Households without Internet
- 23.6% Households without Phone
- 29.3% Households without TV

Household Composition and Disability

- 30.6% Percent Disabled
- 22.9% Percent Under 18 Years of Age
- 21.5% Households with Single Mother
- 93.3% Percent Over 65 Years of Age

Socioeconomic Status

- $12,267.08 Average Income (USD)
- 12.9% Percent No High School Diploma
- 3.8% Unemployment Rate
- 24.7% Population Earning Less than $5.50 per day

Housing Type and Transportation

- 3.3 Median Number of Persons per Housing Unit
- 10.4% Percent of Households with No Vehicle
- 0.0% Population Living in Group Quarters
- 20.8% Households Living in Temporary Structures
- 0.0% Housing Structures with 10 or more Units
Coping Capacity measures the systems, means, and abilities of people and societies to absorb and respond to disruptions in normal function. The bar charts below indicate the socioeconomic themes contributing to the overall Coping Capacity score.

**Emergency Services Capacity**

- **Average Distance to Fire Station (mi)**: 5.98
- **Average Distance to Shelter (mi)**: 1.45
- **Average Distance to Health Facility (mi)**: 5.91

Score: 0.134  
Rank: 14/16 States Assessed

**Transportation Capacity**

- **Road Density (mi per square mi)**: 1.38
- **Maximum Distance to Koror (mi)**: 6
- **Average Distance to Port (mi)**: 1.20

Score: 0.734  
Rank: 5/16 States Assessed
Below are the four thematic areas with the weakest relative scores:

- Housing Characteristics
- Household Composition and Disability
- Socioeconomic Status
- Emergency Services Capacity

Components of resilience are independent of natural hazard exposure. This type of measure helps rank states based on their likelihood of experiencing a disruption outside of a naturally occurring event.
KEY FACTORS INFLUENCING RESILIENCE

Housing Characteristics
Households experiencing access constraints with regard to information, clean water and energy are challenged to maintain a standard of living that meets basic household needs. Facing significant demands on daily routines effectively limit response and recovery capacity and the ability to maintain livelihoods. Limited communications assets, such as no telephone service or access to the internet can impede the ability of households to receive and act upon urgent hazard warning information.

Household Composition and Disability
Single-parent households and those with dependent populations, such as the very young, elderly and the disabled may have more difficulty with mobilizing and evacuating in a timely fashion. The deaf or hard of hearing, for example, may not receive audible hazard alerts. Once evacuated, disabled populations and those with special needs will require additional services and care considerations in the response aftermath and during recovery. Ensure that plans and strategies include special accommodations for these populations.

Socioeconomic Status
Populations experiencing socioeconomic constraints lack the necessary financial resources to adequately prepare for or recover from a natural disaster. The unemployed, low-income households, and those receiving public assistance have little to no financial buffers that would facilitate preparedness actions such as stocking extra food and supplies, support recovery actions such as repairing homes after a disaster, or fund mitigation actions that would protect their homes and property from future hazard impacts.

Emergency Services Capacity
Societies establish capacities to manage emergencies that scale from day-to-day events up to catastrophes that impact all of society. Establishing and maintaining a broad range of systems and resources to support emergency services will increase the capacity for disaster management and response.
## HAZARD-SPECIFIC RISK (HSR)

<table>
<thead>
<tr>
<th>Hazard</th>
<th>RANK</th>
<th>SCORE</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sea Level Rise</td>
<td>9/16</td>
<td>0.209</td>
</tr>
<tr>
<td>Sea Level Rise + Storm Surge</td>
<td>8/16</td>
<td>0.207</td>
</tr>
<tr>
<td>Storm Surge</td>
<td>12/16</td>
<td>0.050</td>
</tr>
<tr>
<td>Tropical Cyclone Wind</td>
<td>8/16</td>
<td>0.122</td>
</tr>
<tr>
<td>Earthquake</td>
<td>6/16</td>
<td>0.000</td>
</tr>
<tr>
<td>Tsunami</td>
<td>12/16</td>
<td>0.050</td>
</tr>
<tr>
<td>Landslide</td>
<td>6/16</td>
<td>0.272</td>
</tr>
</tbody>
</table>
Aimeliik’s score and ranking are due to Low Multi-hazard Exposure combined with Very Low Vulnerability and Low Coping Capacity scores.

Multi-hazard risk component scores compared to overall average country scores:

- **Multi-Hazard Exposure**
  - States Score: 0.407
  - Country Score: 0.498
  - Score: 0.489

- **Vulnerability**
  - States Score: 0.200
  - Country Score: 0.500
  - Score: 0.200

- **Coping Capacity**
  - States Score: 0.000
  - Country Score: 0.513
  - Score: 0.467
PALAU

AIRAI

NDPBA SUBNATIONAL PROFILE

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PALAU
AIRAI

CAPITAL: NGETKIB
Area: 19 mi²

RISK AND VULNERABILITY COMPONENT SCORE

**MULTI-HAZARD RISK (MHR) - Very Low**
Score: 0.218  •  Rank: 16/16

**RESILIENCE (R) - Very High**
Score: 0.934  •  Rank: 2/16

**MULTI-HAZARD EXPOSURE (MHE) - Moderate**
Score: 0.522  •  Rank: 7/16

**VULNERABILITY (V) - Very Low**
Score: 0.066  •  Rank: 15/16

**COPING CAPACITY (CC) - Very High**
Score: 0.934  •  Rank: 2/16
MULTI-HAZARD EXPOSURE (MHE)

RANK: 7 / 16 STATES
SCORE: 0.522

ESTIMATED EXPOSURE TO EACH HAZARD:

- Sea Level Rise
  - 10.4%
  - 262
  - Critical Infrastructure Exposed: 13.8%

- Tsunami
  - 6.4%
  - 163
  - Critical Infrastructure Exposed: 5.4%

- Storm Surge + Sea Level Rise
  - 13.8%
  - 350
  - Critical Infrastructure Exposed: 15.0%

- Earthquake
  - 0.0%
  - 0
  - Critical Infrastructure Exposed: 0.0%

- Storm Surge
  - 6.6%
  - 167
  - Critical Infrastructure Exposed: 5.4%

- Landslide
  - 6.8%
  - 173
  - $17.4 Million
  - Critical Infrastructure Exposed: 9.4%

- Tropical Cyclone Wind
  - 100%
  - 2,529
  - $170 Million
  - Critical Infrastructure Exposed: 100%
VULNERABILITY (V)

Vulnerability measures the conditions and processes that increase susceptibility of communities and systems to the damaging effects of hazards. Vulnerability in Airai is primarily driven by Housing Type and Transportation and Housing Characteristics. The bar charts indicate the socioeconomic themes contributing to the overall Vulnerability score.

### Housing Characteristics
- 7.7% Households Using Biomass for Fuel
- 1.5% Households without Electricity
- 3.5% Households without Access to Public Water

### Communication Assets
- 3.7% Households without Cell Phone
- 49.9% Households without Computer
- 43.9% Households without Internet
- 25.9% Households without Phone
- 25.9% Households without TV

### Household Composition and Disability
- 3.2% Percent Disabled
- 23.8% Percent Under 18 Years of Age
- 23.8% Households with Single Mother
- 86.6% Percent Over 65 Years of Age

### Socioeconomic Status
- $13,864.52 Average Income (USD)
- 11.2% Percent No High School Diploma
- 2.7% Unemployment Rate
- 26.1% Population Earning Less than $5.50 per day

### Housing Type and Transportation
- 3.5 Median Number of Persons per Housing Unit
- 12.4% Percent of Households with No Vehicle
- 0.5% Population Living in Group Quarters
- 0.5% Institutionalized Population
- 10.2% Households Living in Temporary Structures
- 1.9% Housing Structures with 10 or more Units
COPING CAPACITY (CC)  \( \text{RANK: 2/16 STATES ASSESSED} \)  
\( \text{SCORE: 0.934} \)

Coping Capacity measures the systems, means, and abilities of people and societies to absorb and respond to disruptions in normal function. The bar charts below indicate the socioeconomic themes contributing to the overall Coping Capacity score.

**Emergency Services Capacity**

- Average Distance to Fire Station (mi): 1.06
- Average Distance to Shelter (mi): 0.63
- Average Distance to Health Facility (mi): 1.11

\( \text{RANK: 3/16 STATES ASSESSED} \)  
\( \text{SCORE: 0.867} \)

**Transportation Capacity**

- Road Density (mi per square mi): 1.63
- Maximum Distance to Koror (mi): 3
- Average Distance to Port (mi): 0.70

\( \text{RANK: 2/16 STATES ASSESSED} \)  
\( \text{SCORE: 0.934} \)
RESILIENCE (R)  RANK: 2 / 16  STATES ASSESSED  SCORE: 0.934

Components of resilience are independent of natural hazard exposure. This type of measure helps rank states based on their likelihood of experiencing a disruption outside of a naturally occurring event.

Below are the four thematic areas with the weakest relative scores:

- Housing Type and Transportation
- Housing Characteristics
- Emergency Services Capacity
- Transportation Capacity
KEY FACTORS INFLUENCING RESILIENCE

Housing Type and Transportation
Populations living in temporary housing are more susceptible to damage and losses resulting from hazard impacts. In addition, higher density living situations such as multi-unit housing, populations residing in group living quarters or crowded housing increase susceptibility to negative consequences as a result of hazard exposure. Populations with limited vehicle access, and especially those living in isolated areas, are more likely to experience mobility challenges during an evacuation, and have difficulty accessing needed supplies and services before, during and after a hazard event.

Housing Characteristics
Households experiencing access constraints with regard to information, clean water and energy are challenged to maintain a standard of living that meets basic household needs. Facing significant demands on daily routines effectively limit response and recovery capacity and the ability to maintain livelihoods. Limited communications assets, such as no telephone service or access to the internet can impede the ability of households to receive and act upon urgent hazard warning information.

Emergency Services Capacity
Societies establish capacities to manage emergencies that scale from day-to-day events up to catastrophes that impact all of society. Establishing and maintaining a broad range of systems and resources to support emergency services will increase the capacity for disaster management and response.

Transportation Capacity
Denser and more diverse transportation networks provide more options for bringing outside resources into an impacted area and increase the ability of response stakeholders to access affected populations. Improved transportation capacity supports the ability to distribute resources before, during, and after a disaster.
HAZARD-SPECIFIC RISK (HSR)

Sea Level Rise
- RANK: 14 / 16 STATES ASSESSED
- SCORE: 0.027

Sea Level Rise + Storm Surge
- RANK: 15 / 16 STATES ASSESSED
- SCORE: 0.026

Storm Surge
- RANK: 13 / 16 STATES ASSESSED
- SCORE: 0.030

Tropical Cyclone Wind
- RANK: 13 / 16 STATES ASSESSED
- SCORE: 0.033

Earthquake
- RANK: 6 / 16 STATES ASSESSED
- SCORE: 0.000

Tsunami
- RANK: 13 / 16 STATES ASSESSED
- SCORE: 0.030

Landslide
- RANK: 12 / 16 STATES ASSESSED
- SCORE: 0.039
Airai’s score and ranking are due to Moderate Multi-hazard Exposure combined with Very Low Vulnerability and Very High Coping Capacity scores.

Multi-hazard risk component scores compared to overall average country scores:
PALAU ANGAUR

CAPITAL: NGARAMASCH
Area: 3 mi²

RISK AND VULNERABILITY COMPONENT SCORE

**MULTI-HAZARD RISK (MHR) - Low**
- Score: 0.407  •  Rank: 12/16

**RESILIENCE (R) - High**
- Score: 0.634  •  Rank: 4/16

**MULTI-HAZARD EXPOSURE (MHE) - Low**
- Score: 0.489  •  Rank: 9/16

**VULNERABILITY (V) - Low**
- Score: 0.400  •  Rank: 10/16

**COPING CAPACITY (CC) - Moderate**
- Score: 0.667  •  Rank: 6/16

Population (2020 Census)
- 114

Poverty
- 24.4%

No High School Diploma
- 22.5%

Households without Internet
- 83.7%

Temporary Structures as Housing
- 4.08%
## MULTI-HAZARD EXPOSURE (MHE)

**RANK: 9 / 16 STATES**  
**SCORE: 0.489**

### ESTIMATED EXPOSURE TO EACH HAZARD:

<table>
<thead>
<tr>
<th>Hazard</th>
<th>Percentage</th>
<th>Critical Exposed</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sea Level Rise</td>
<td>4.3%</td>
<td>5</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Critical Infrastructure Exposed: 42.9%</td>
</tr>
<tr>
<td>Tsunami</td>
<td>43.7%</td>
<td>50</td>
</tr>
<tr>
<td></td>
<td></td>
<td>$10.3 Million</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Critical Infrastructure Exposed: 35.7%</td>
</tr>
<tr>
<td>Storm Surge + Sea Level Rise</td>
<td>10.5%</td>
<td>12</td>
</tr>
<tr>
<td></td>
<td></td>
<td>$10.3 Million</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Critical Infrastructure Exposed: 42.9%</td>
</tr>
<tr>
<td>Earthquake</td>
<td>0.0%</td>
<td>0</td>
</tr>
<tr>
<td></td>
<td></td>
<td>$0</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Critical Infrastructure Exposed: 0.0%</td>
</tr>
<tr>
<td>Storm Surge</td>
<td>48.3%</td>
<td>55</td>
</tr>
<tr>
<td></td>
<td></td>
<td>$10.3 Million</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Critical Infrastructure Exposed: 50.0%</td>
</tr>
<tr>
<td>Landslide</td>
<td>7.8%</td>
<td>9</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Critical Infrastructure Exposed: 0.0%</td>
</tr>
<tr>
<td>Tropical Cyclone Wind</td>
<td>100%</td>
<td>114</td>
</tr>
<tr>
<td></td>
<td></td>
<td>$12.5 Million</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Critical Infrastructure Exposed: 100%</td>
</tr>
</tbody>
</table>
VULNERABILITY (V)  
RANK: 10 / 16 STATES ASSESSED  
SCORE: 0.400

Vulnerability measures the conditions and processes that increase susceptibility of communities and systems to the damaging effects of hazards. Vulnerability in Angaur is primarily driven by Housing Characteristics and Socioeconomic Status. The bar charts indicate the socioeconomic themes contributing to the overall Vulnerability score.

**Housing Characteristics**  
RANK: 6/16 STATES ASSESSED  
SCORE: 0.666

<table>
<thead>
<tr>
<th>Percentage</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>42.9%</td>
<td>Households Using Biomass for Fuel</td>
</tr>
<tr>
<td>2.0%</td>
<td>Households without Electricity</td>
</tr>
<tr>
<td>4.1%</td>
<td>Households without Access to Public Water</td>
</tr>
</tbody>
</table>

**Communication Assets**  
RANK: 1/16 STATES ASSESSED  
SCORE: 1.000

<table>
<thead>
<tr>
<th>Percentage</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>12.2%</td>
<td>Households without Cell Phone</td>
</tr>
<tr>
<td>89.8%</td>
<td>Households without Computer</td>
</tr>
<tr>
<td>83.7%</td>
<td>Households without Internet</td>
</tr>
<tr>
<td>46.9%</td>
<td>Households without Phone</td>
</tr>
<tr>
<td>69.4%</td>
<td>Households without TV</td>
</tr>
</tbody>
</table>

**Household Composition and Disability**  
RANK: 8/16 STATES ASSESSED  
SCORE: 0.533

<table>
<thead>
<tr>
<th>Percentage</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>6.1%</td>
<td>Percent Disabled</td>
</tr>
<tr>
<td>23.7%</td>
<td>Percent Under 18 Years of Age</td>
</tr>
<tr>
<td>30.6%</td>
<td>Households with Single Mother</td>
</tr>
<tr>
<td>60.0%</td>
<td>Percent Over 65 Years of Age</td>
</tr>
</tbody>
</table>

**Socioeconomic Status**  
RANK: 6/16 STATES ASSESSED  
SCORE: 0.666

<table>
<thead>
<tr>
<th>Measures</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>Average Income (USD)</td>
<td>$7,436.20</td>
</tr>
<tr>
<td>Percent No High School Diploma</td>
<td>22.5%</td>
</tr>
<tr>
<td>Unemployment Rate</td>
<td>3.4%</td>
</tr>
<tr>
<td>Population Earning Less than $5.50 per day</td>
<td>24.4%</td>
</tr>
</tbody>
</table>

**Housing Type and Transportation**  
RANK: 13/16 STATES ASSESSED  
SCORE: 0.000

<table>
<thead>
<tr>
<th>Measures</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>Median Number of Persons per Housing Unit</td>
<td>2.3</td>
</tr>
<tr>
<td>Percent of Households with No Vehicle</td>
<td>44.9%</td>
</tr>
<tr>
<td>Population Living in Group Quarters</td>
<td>0.0%</td>
</tr>
<tr>
<td>Institutionalized Population</td>
<td>-</td>
</tr>
<tr>
<td>Households Living in Temporary Structures</td>
<td>4.1%</td>
</tr>
<tr>
<td>Housing Structures with 10 or more Units</td>
<td>0.0%</td>
</tr>
</tbody>
</table>
**COPING CAPACITY (CC)**  
**RANK: 6 / 16 STATES ASSESSED**  
**SCORE: 0.667**

Coping Capacity measures the systems, means, and abilities of people and societies to absorb and respond to disruptions in normal function. The bar charts below indicate the socioeconomic themes contributing to the overall Coping Capacity score.

### Emergency Services Capacity

<table>
<thead>
<tr>
<th>Metric</th>
<th>Value</th>
<th>RANK</th>
<th>Score</th>
<th>States Assessed</th>
</tr>
</thead>
<tbody>
<tr>
<td>Average Distance to Fire Station (mi)</td>
<td>38.67</td>
<td>0</td>
<td>0.667</td>
<td>6 / 16</td>
</tr>
<tr>
<td>Average Distance to Shelter (mi)</td>
<td>0.34</td>
<td>1</td>
<td>0.667</td>
<td>6 / 16</td>
</tr>
<tr>
<td>Average Distance to Health Facility (mi)</td>
<td>0.32</td>
<td>1</td>
<td>0.667</td>
<td>6 / 16</td>
</tr>
</tbody>
</table>

### Transportation Capacity

<table>
<thead>
<tr>
<th>Metric</th>
<th>Value</th>
<th>RANK</th>
<th>Score</th>
<th>States Assessed</th>
</tr>
</thead>
<tbody>
<tr>
<td>Road Density (mi per square mi)</td>
<td>1.29</td>
<td>0</td>
<td>0.534</td>
<td>8 / 16</td>
</tr>
<tr>
<td>Maximum Distance to Koror (mi)</td>
<td>18</td>
<td>1</td>
<td>0.534</td>
<td>8 / 16</td>
</tr>
<tr>
<td>Average Distance to Port (mi)</td>
<td>0.36</td>
<td>1</td>
<td>0.534</td>
<td>8 / 16</td>
</tr>
</tbody>
</table>
Below are the four thematic areas with the weakest relative scores:

- Housing Characteristics
- Socioeconomic Status
- Household Composition and Disability
- Transportation Capacity

Components of resilience are independent of natural hazard exposure. This type of measure helps rank states based on their likelihood of experiencing a disruption outside of a naturally occurring event.
KEY FACTORS INFLUENCING RESILIENCE

Housing Characteristics
Households experiencing access constraints with regard to information, clean water and energy are challenged to maintain a standard of living that meets basic household needs. Facing significant demands on daily routines effectively limit response and recovery capacity and the ability to maintain livelihoods. Limited communications assets, such as no telephone service or access to the internet can impede the ability of households to receive and act upon urgent hazard warning information.

Socioeconomic Status
Populations experiencing socioeconomic constraints lack the necessary financial resources to adequately prepare for or recover from a natural disaster. The unemployed, low-income households, and those receiving public assistance have little to no financial buffers that would facilitate preparedness actions such as stocking extra food and supplies, support recovery actions such as repairing homes after a disaster, or fund mitigation actions that would protect their homes and property from future hazard impacts.

Household Composition and Disability
Single-parent households and those with dependent populations, such as the very young, elderly and the disabled may have more difficulty with mobilizing and evacuating in a timely fashion. The deaf or hard of hearing, for example, may not receive audible hazard alerts. Once evacuated, disabled populations and those with special needs will require additional services and care considerations in the response aftermath and during recovery. Ensure that plans and strategies include special accommodations for these populations.

Transportation Capacity
Denser and more diverse transportation networks provide more options for bringing outside resources into an impacted area and increase the ability of response stakeholders to access affected populations. Improved transportation capacity supports the ability to distribute resources before, during, and after a disaster.
HAZARD-SPECIFIC RISK (HSR)

- **Sea Level Rise**: RANK: 14 / 16 STATES ASSESSED  
  SCORE: 0.177
- **Sea Level Rise + Storm Surge**: RANK: 14 / 16 STATES ASSESSED  
  SCORE: 0.102
- **Storm Surge**: RANK: 5 / 16 STATES ASSESSED  
  SCORE: 0.256
- **Tropical Cyclone Wind**: RANK: 11 / 16 STATES ASSESSED  
  SCORE: 0.073
- **Earthquake**: RANK: 6 / 16 STATES ASSESSED  
  SCORE: 0.000
- **Tsunami**: RANK: 6 / 16 STATES ASSESSED  
  SCORE: 0.248
- **Landslide**: RANK: 9 / 16 STATES ASSESSED  
  SCORE: 0.079
**MULTI-HAZARD RISK (MHR)**

Angaur's score and ranking are due to Low Multi-hazard Exposure combined with Low Vulnerability and Moderate Coping Capacity scores.

Multi-hazard risk component scores compared to overall average country scores:

- **Multi-Hazard Exposure**: States Score 0.489, Country Score 0.498
- **Vulnerability**: States Score 0.400, Country Score 0.500
- **Coping Capacity**: States Score 0.667, Country Score 0.513
Better solutions.
Fewer disasters.

Safer world.

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PALAU
HATOHOBEI

NDPBA SUBNATIONAL PROFILE
PALAU
HATOHOBEI

CAPITAL: HATOHOBEI
Area: 0.3 mi²

RISK AND VULNERABILITY COMPONENT SCORE

**MULTI-HAZARD RISK (MHR) - High**
Score: 0.589 • Rank: 6/16

**RESILIENCE (R) - Very Low**
Score: 0.134 • Rank: 14/16

**MULTI-HAZARD EXPOSURE (MHE) - Very Low**
Score: 0.033 • Rank: 16/16

**VULNERABILITY (V) - High**
Score: 0.733 • Rank: 5/16

**COPING CAPACITY (CC) - Very Low**
Score: 0.000 • Rank: 16/16

Population (2020 Census): 39

Poverty: 8.7%

No High School Diploma: 28.6%

Households without Internet: 0.0%

Temporary Structures as Housing: 0.00%
MULTI-HAZARD EXPOSURE (MHE)

RANK: 16 / 16 STATES
SCORE: 0.033

ESTIMATED EXPOSURE TO EACH HAZARD:

- **Sea Level Rise**
  - **77.9%**
  - Critical Infrastructure Exposed: 50.0%

- **Tsunami**
  - **0.0%**
  - Critical Infrastructure Exposed: 0.0%

- **Storm Surge + Sea Level Rise**
  - **85.5%**
  - Critical Infrastructure Exposed: 50.0%

- **Storm Surge**
  - **0.0%**
  - Critical Infrastructure Exposed: 0.0%

- **Tropical Cyclone Wind**
  - **0%**
  - Critical Infrastructure Exposed: 0%

- **Earthquake**
  - **0.0%**
  - Critical Infrastructure Exposed: 0.0%

- **Landslide**
  - **0.0%**
  - Critical Infrastructure Exposed: 0%

- **Tsunami**
  - **0%**
  - Critical Infrastructure Exposed: 0%
VULNERABILITY (V)

Vulnerability measures the conditions and processes that increase susceptibility of communities and systems to the damaging effects of hazards. Vulnerability in Hatohobei is primarily driven by Housing Type and Transportation and Housing Characteristics. The bar charts indicate the socioeconomic themes contributing to the overall Vulnerability score.

Housing Characteristics

- 88.9% Households Using Biomass for Fuel
- 100.0% Households without Electricity

Communication Assets

- 44.4% Households without Cell Phone
- 77.8% Households without Computer

Household Composition and Disability

- 5.1% Percent Disabled
- 41.0% Percent Under 18 Years of Age

Socioeconomic Status

- $7,812.00 Average Income (USD)
- 28.6% Percent No High School Diploma

Housing Type and Transportation

- 3.8 Median Number of Persons per Housing Unit
- 100.0% Percent of Households with No Vehicle
COPING CAPACITY (CC)  
RANK: 16 / 16 STATES ASSESSED  
SCORE: 0.000

Coping Capacity measures the systems, means, and abilities of people and societies to absorb and respond to disruptions in normal function. The bar charts below indicate the socioeconomic themes contributing to the overall Coping Capacity score.

Emergency Services Capacity

Score: 0.000  
RANK: 16/16 STATES ASSESSED

- Average Distance to Fire Station (mi): 376.55
- Average Distance to Shelter (mi): 338.65
- Average Distance to Health Facility (mi): 338.65

Transportation Capacity

Score: 0.000  
RANK: 16/16 STATES ASSESSED

- Road Density (mi per square mi): 0.00
- Maximum Distance to Koror (mi): 373
- Average Distance to Port (mi): 338.65
Below are the four thematic areas with the weakest relative scores:

- Housing Type and Transportation
- Housing Characteristics
- Emergency Services Capacity
- Transportation Capacity

Components of resilience are independent of natural hazard exposure. This type of measure helps rank states based on their likelihood of experiencing a disruption outside of a naturally occurring event.
KEY FACTORS INFLUENCING RESILIENCE

Housing Type and Transportation
Populations living in temporary housing are more susceptible to damage and losses resulting from hazard impacts. In addition, higher density living situations such as multi-unit housing, populations residing in group living quarters or crowded housing increase susceptibility to negative consequences as a result of hazard exposure. Populations with limited vehicle access, and especially those living in isolated areas, are more likely to experience mobility challenges during an evacuation, and have difficulty accessing needed supplies and services before, during and after a hazard event.

Housing Characteristics
Households experiencing access constraints with regard to information, clean water and energy are challenged to maintain a standard of living that meets basic household needs. Facing significant demands on daily routines effectively limit response and recovery capacity and the ability to maintain livelihoods. Limited communications assets, such as no telephone service or access to the internet can impede the ability of households to receive and act upon urgent hazard warning information.

Emergency Services Capacity
Societies establish capacities to manage emergencies that scale from day-to-day events up to catastrophes that impact all of society. Establishing and maintaining a broad range of systems and resources to support emergency services will increase the capacity for disaster management and response.

Transportation Capacity
Denser and more diverse transportation networks provide more options for bringing outside resources into an impacted area and increase the ability of response stakeholders to access affected populations. Improved transportation capacity supports the ability to distribute resources before, during, and after a disaster.
HAZARD-SPECIFIC RISK (HSR)

- **Sea Level Rise**
  - Rank: 2 / 16 States Assessed
  - Score: 0.418

- **Sea Level Rise + Storm Surge**
  - Rank: 3 / 16 States Assessed
  - Score: 0.377

- **Storm Surge**
  - Rank: 14 / 16 States Assessed
  - Score: 0.000

- **Tropical Cyclone Wind**
  - Rank: 15 / 16 States Assessed
  - Score: 0.000

- **Earthquake**
  - Rank: 6 / 16 States Assessed
  - Score: 0.000

- **Tsunami**
  - Rank: 14 / 16 States Assessed
  - Score: 0.000

- **Landslide**
  - Rank: 13 / 16 States Assessed
  - Score: 0.000
Hatohobei’s score and ranking are due to Very Low Multi-hazard Exposure combined with High Vulnerability and Very Low Coping Capacity scores.
PALAU
KAYANGEL

CAPITAL: KAYANGEL
Area: 0.7 mi²

RISK AND VULNERABILITY COMPONENT SCORE

MULTI-HAZARD RISK (MHR) - Very Low
Score: 0.370 • Rank: 14/16

RESILIENCE (R) - High
Score: 0.701 • Rank: 3/16

MULTI-HAZARD EXPOSURE (MHE) - Moderate
Score: 0.511 • Rank: 8/16

VULNERABILITY (V) - Moderate
Score: 0.466 • Rank: 9/16

COPING CAPACITY (CC) - High
Score: 0.867 • Rank: 3/16

Population (2020 Census) 41
Poverty 12.9%
No High School Diploma 13.8%
Households without Internet 72.0%
Temporary Structures as Housing 4.00%
MULTI-HAZARD EXPOSURE (MHE)

RANK: 8 / 16 STATES
SCORE: 0.511

ESTIMATED EXPOSURE TO EACH HAZARD:

- **Sea Level Rise** 10.5%
  - 4
  - Critical Infrastructure Exposed: 20.0%

- **Tsunami** 99.5%
  - 41
  - $7.41 Million
  - Critical Infrastructure Exposed: 100.0%

- **Storm Surge + Sea Level Rise** 60.1%
  - 25
  - $1.99 Million
  - Critical Infrastructure Exposed: 100.0%

- **Storm Surge** 99.5%
  - 41
  - $7.41 Million
  - Critical Infrastructure Exposed: 100.0%

- **Earthquake** 0.0%
  - 0
  - $0
  - Critical Infrastructure Exposed: 0.0%

- **Landslide** 0.0%
  - 0
  - $0
  - Critical Infrastructure Exposed: 0.0%

- **Tropical Cyclone Wind** 100%
  - 41
  - $7.41 Million
  - Critical Infrastructure Exposed: 100%
VULNERABILITY (V)

RANK: 9 / 16 STATES ASSESSED
SCORE: 0.466

Vulnerability measures the conditions and processes that increase susceptibility of communities and systems to the damaging effects of hazards. Vulnerability in Kayangel is primarily driven by Housing Characteristics and Household Composition and Disability. The bar charts indicate the socioeconomic themes contributing to the overall Vulnerability score.

Housing Characteristics

RANK: 5/16 STATES ASSESSED
SCORE: 0.733

- 80.0% Households Using Biomass for Fuel
- 0.0% Households without Electricity
- 28.0% Households without Access to Public Water

Communication Assets

RANK: 2/16 STATES ASSESSED
SCORE: 0.933

- 20.0% Households without Cell Phone
- 92.0% Households without Computer
- 72.0% Households without Internet
- 24.0% Households without Phone
- 48.0% Households without TV

Household Composition and Disability

RANK: 5/16 STATES ASSESSED
SCORE: 0.733

- 22.0% Percent Disabled
- 24.4% Percent Under 18 Years of Age
- 6.7% Households with Single Mother
- 100.0% Percent Over 65 Years of Age

Socioeconomic Status

RANK: 13/16 STATES ASSESSED
SCORE: 0.200

- $6,961.96 Average Income (USD)
- 13.8% Percent No High School Diploma
- 0.0% Unemployment Rate
- 12.9% Population Earning Less than $5.50 per day

Housing Type and Transportation

RANK: 10/16 STATES ASSESSED
SCORE: 0.200

- 2.7 Median Number of Persons per Housing Unit
- 72.0% Percent of Households with No Vehicle
- 0.0% Population Living in Group Quarters
- 4.0% Households Living in Temporary Structures
- 0.0% Housing Structures with 10 or more Units
COPING CAPACITY (CC)  

RANK: 3 / 16  
SCORE: 0.867

Coping Capacity measures the systems, means, and abilities of people and societies to absorb and respond to disruptions in normal function. The bar charts below indicate the socioeconomic themes contributing to the overall Coping Capacity score.

**Emergency Services Capacity**

0  
1  
SCORE: 0.800  
RANK: 4/16

- Average Distance to Fire Station (mi): 35.36
- Average Distance to Shelter (mi): 0.24
- Average Distance to Health Facility (mi): 0.18

**Transportation Capacity**

0  
1  
SCORE: 0.867  
RANK: 3/16

- Road Density (mi per square mi): 29
- Maximum Distance to Koror (mi): 9.22
- Average Distance to Port (mi): 0.21
RESILIENCE (R)  
RANK: 3 / 16  STATES ASSESSED  
SCORE: 0.701

Components of resilience are independent of natural hazard exposure. This type of measure helps rank states based on their likelihood of experiencing a disruption outside of a naturally occurring event.

Below are the four thematic areas with the weakest relative scores:

- Housing Characteristics
- Household Composition and Disability
- Socioeconomic Status
- Emergency Services Capacity
KEY FACTORS INFLUENCING RESILIENCE

**Housing Characteristics**
Households experiencing access constraints with regard to information, clean water and energy are challenged to maintain a standard of living that meets basic household needs. Facing significant demands on daily routines effectively limit response and recovery capacity and the ability to maintain livelihoods. Limited communications assets, such as no telephone service or access to the internet can impede the ability of households to receive and act upon urgent hazard warning information.

**Household Composition and Disability**
Single-parent households and those with dependent populations, such as the very young, elderly and the disabled may have more difficulty with mobilizing and evacuating in a timely fashion. The deaf or hard of hearing, for example, may not receive audible hazard alerts. Once evacuated, disabled populations and those with special needs will require additional services and care considerations in the response aftermath and during recovery. Ensure that plans and strategies include special accommodations for these populations.

**Socioeconomic Status**
Populations experiencing socioeconomic constraints lack the necessary financial resources to adequately prepare for or recover from a natural disaster. The unemployed, low-income households, and those receiving public assistance have little to no financial buffers that would facilitate preparedness actions such as stocking extra food and supplies, support recovery actions such as repairing homes after a disaster, or fund mitigation actions that would protect their homes and property from future hazard impacts.

**Emergency Services Capacity**
Societies establish capacities to manage emergencies that scale from day-to-day events up to catastrophes that impact all of society. Establishing and maintaining a broad range of systems and resources to support emergency services will increase the capacity for disaster management and response.
HAZARD-SPECIFIC RISK (HSR)

- **Sea Level Rise**
  - **Score**: 0.100
  - **Rank**: 13 / 16 states assessed

- **Sea Level Rise + Storm Surge**
  - **Score**: 0.152
  - **Rank**: 11 / 16 states assessed

- **Storm Surge**
  - **Score**: 0.229
  - **Rank**: 7 / 16 states assessed

- **Tropical Cyclone Wind**
  - **Score**: 0.030
  - **Rank**: 14 / 16 states assessed

- **Earthquake**
  - **Score**: 0.000
  - **Rank**: 6 / 16 states assessed

- **Tsunami**
  - **Score**: 0.229
  - **Rank**: 7 / 16 states assessed

- **Landslide**
  - **Score**: 0.000
  - **Rank**: 13 / 16 states assessed
MULTI-HAZARD RISK (MHR)

Kayangel's score and ranking are due to Moderate Multi-hazard Exposure combined with Moderate Vulnerability and High Coping Capacity scores.

Multi-hazard risk component scores compared to overall average country scores:

- **Multi-Hazard Exposure**: States Score: 0.466, Country Score: 0.498, Score: 0.511
- **Vulnerability**: States Score: 0.500, Country Score: 0.500, Score: 0.466
- **Coping Capacity**: States Score: 0.513, Country Score: 0.513, Score: 0.867
RISK AND VULNERABILITY
COMPONENT SCORE

MULTI-HAZARD RISK (MHR) - Very Low
Score: 0.244 • Rank: 15/16

RESILIENCE (R) - Very High
Score: 1.000 • Rank: 1/16

MULTI-HAZARD EXPOSURE (MHE) - Very High
Score: 0.733 • Rank: 2/16

VULNERABILITY (V) - Very Low
Score: 0.000 • Rank: 16/16

COPING CAPACITY (CC) - Very High
Score: 1.000 • Rank: 1/16

Population (2020 Census)
11,199

Poverty
22.6%

No High School Diploma
9.4%

Households without Internet
52.3%

Temporary Structures as Housing
8.49%
MULTI-HAZARD EXPOSURE (MHE)

RANK: 2 / 16 STATES
SCORE: 0.733

ESTIMATED EXPOSURE TO EACH HAZARD:

- **Sea Level Rise** 25.0%
  - 2,805 people
  - $113,200
  - Critical Infrastructure Exposed: 43.5%

- **Tsunami** 26.9%
  - 3,014 people
  - $148,500
  - Critical Infrastructure Exposed: 37.6%

- **Storm Surge + Sea Level Rise** 31.5%
  - 3,528 people
  - $113,200
  - Critical Infrastructure Exposed: 44.8%

- **Earthquake** 0.0%
  - 0 people
  - $0
  - Critical Infrastructure Exposed: 0.0%

- **Storm Surge** 27.6%
  - 3,092 people
  - $148,500
  - Critical Infrastructure Exposed: 38.2%

- **Landslide** 33.3%
  - 3,734 people
  - $9.42 Million
  - Critical Infrastructure Exposed: 33.9%

- **Tropical Cyclone Wind** 100%
  - 11,199 people
  - $429 Million
  - Critical Infrastructure Exposed: 100%
VULNERABILITY (V)

Vulnerability measures the conditions and processes that increase susceptibility of communities and systems to the damaging effects of hazards. Vulnerability in Koror is primarily driven by Housing Type and Transportation and Household Composition and Disability. The bar charts indicate the socioeconomic themes contributing to the overall Vulnerability score.

### Housing Characteristics

<table>
<thead>
<tr>
<th>Percentage</th>
<th>Description</th>
<th>Rank</th>
<th>Score</th>
</tr>
</thead>
<tbody>
<tr>
<td>2.6%</td>
<td>Households Using Biomass for Fuel</td>
<td>16/16</td>
<td>0.000</td>
</tr>
<tr>
<td>1.5%</td>
<td>Households without Electricity</td>
<td>16/16</td>
<td>0.000</td>
</tr>
<tr>
<td>2.5%</td>
<td>Households without Access to Public Water</td>
<td>16/16</td>
<td>0.000</td>
</tr>
</tbody>
</table>

### Communication Assets

<table>
<thead>
<tr>
<th>Percentage</th>
<th>Description</th>
<th>Rank</th>
<th>Score</th>
</tr>
</thead>
<tbody>
<tr>
<td>3.8%</td>
<td>Households without Cell Phone</td>
<td>11/16</td>
<td>0.333</td>
</tr>
<tr>
<td>51.9%</td>
<td>Households without Computer</td>
<td>11/16</td>
<td>0.333</td>
</tr>
<tr>
<td>52.3%</td>
<td>Households without Internet</td>
<td>11/16</td>
<td>0.333</td>
</tr>
<tr>
<td>35.4%</td>
<td>Households without Phone</td>
<td>11/16</td>
<td>0.333</td>
</tr>
<tr>
<td>28.5%</td>
<td>Households without TV</td>
<td>11/16</td>
<td>0.333</td>
</tr>
</tbody>
</table>

### Household Composition and Disability

<table>
<thead>
<tr>
<th>Percentage</th>
<th>Description</th>
<th>Rank</th>
<th>Score</th>
</tr>
</thead>
<tbody>
<tr>
<td>5.1%</td>
<td>Percent Disabled</td>
<td>12/16</td>
<td>0.266</td>
</tr>
<tr>
<td>22.1%</td>
<td>Percent Under 18 Years of Age</td>
<td>12/16</td>
<td>0.266</td>
</tr>
<tr>
<td>27.0%</td>
<td>Households with Single Mother</td>
<td>12/16</td>
<td>0.266</td>
</tr>
<tr>
<td>73.3%</td>
<td>Percent Over 65 Years of Age</td>
<td>12/16</td>
<td>0.266</td>
</tr>
</tbody>
</table>

### Socioeconomic Status

<table>
<thead>
<tr>
<th>Metric</th>
<th>Value</th>
<th>Rank</th>
<th>Score</th>
</tr>
</thead>
<tbody>
<tr>
<td>Average Income (USD)</td>
<td>$12,717.41</td>
<td>15/16</td>
<td>0.066</td>
</tr>
<tr>
<td>Percent No High School Diploma</td>
<td>9.4%</td>
<td>15/16</td>
<td>0.066</td>
</tr>
<tr>
<td>Unemployment Rate</td>
<td>3.8%</td>
<td>15/16</td>
<td>0.066</td>
</tr>
<tr>
<td>Population Earning Less than $5.50 per day</td>
<td>22.6%</td>
<td>15/16</td>
<td>0.066</td>
</tr>
</tbody>
</table>

### Housing Type and Transportation

<table>
<thead>
<tr>
<th>Percentage</th>
<th>Description</th>
<th>Rank</th>
<th>Score</th>
</tr>
</thead>
<tbody>
<tr>
<td>3.3%</td>
<td>Median Number of Persons per Housing Unit</td>
<td>5/16</td>
<td>0.500</td>
</tr>
<tr>
<td>18.1%</td>
<td>Percent of Households with No Vehicle</td>
<td>5/16</td>
<td>0.500</td>
</tr>
<tr>
<td>0.2%</td>
<td>Population Living in Group Quarters</td>
<td>5/16</td>
<td>0.500</td>
</tr>
<tr>
<td>0.2%</td>
<td>Institutionalized Population</td>
<td>5/16</td>
<td>0.500</td>
</tr>
<tr>
<td>8.5%</td>
<td>Households Living in Temporary Structures</td>
<td>5/16</td>
<td>0.500</td>
</tr>
<tr>
<td>8.8%</td>
<td>Housing Structures with 10 or more Units</td>
<td>5/16</td>
<td>0.500</td>
</tr>
</tbody>
</table>
COPING CAPACITY (CC)  
RANK: 1 / 16 STATES ASSESSED  
SCORE: 1.000

Coping Capacity measures the systems, means, and abilities of people and societies to absorb and respond to disruptions in normal function. The bar charts below indicate the socioeconomic themes contributing to the overall Coping Capacity score.

**Emergency Services Capacity**  
SCORE: 1.000  
RANK: 1/16 STATES ASSESSED

- Average Distance to Fire Station (mi): 1.09
- Average Distance to Shelter (mi): 0.32
- Average Distance to Health Facility (mi): 0.57

**Transportation Capacity**  
SCORE: 1.000  
RANK: 1/16 STATES ASSESSED

- Road Density (mi per square mi): 1.46
- Maximum Distance to Koror (mi): 0.55
- Average Distance to Port (mi): 0.0

Coping Capacity measures the systems, means, and abilities of people and societies to absorb and respond to disruptions in normal function. The bar charts below indicate the socioeconomic themes contributing to the overall Coping Capacity score.
RESILIENCE (R)  RANK: 1 / 16 STATES ASSESSED  SCORE: 1.000

Components of resilience are independent of natural hazard exposure. This type of measure helps rank states based on their likelihood of experiencing a disruption outside of a naturally occurring event.

Below are the three thematic areas with the weakest relative scores:

- Housing Type and Transportation
- Household Composition and Disability
- Socioeconomic Status
KEY FACTORS INFLUENCING RESILIENCE

Housing Type and Transportation
Populations living in temporary housing are more susceptible to damage and losses resulting from hazard impacts. In addition, higher density living situations such as multi-unit housing, populations residing in group living quarters or crowded housing increase susceptibility to negative consequences as a result of hazard exposure. Populations with limited vehicle access, and especially those living in isolated areas, are more likely to experience mobility challenges during an evacuation, and have difficulty accessing needed supplies and services before, during and after a hazard event.

Household Composition and Disability
Single-parent households and those with dependent populations, such as the very young, elderly and the disabled may have more difficulty with mobilizing and evacuating in a timely fashion. The deaf or hard of hearing, for example, may not receive audible hazard alerts. Once evacuated, disabled populations and those with special needs will require additional services and care considerations in the response aftermath and during recovery. Ensure that plans and strategies include special accommodations for these populations.

Socioeconomic Status
Populations experiencing socioeconomic constraints lack the necessary financial resources to adequately prepare for or recover from a natural disaster. The unemployed, low-income households, and those receiving public assistance have little to no financial buffers that would facilitate preparedness actions such as stocking extra food and supplies, support recovery actions such as repairing homes after a disaster, or fund mitigation actions that would protect their homes and property from future hazard impacts.
HAZARD-SPECIFIC RISK (HSR)

- Sea Level Rise
  - RANK: 15 / 16 STATES ASSESSED
  - SCORE: 0.000

- Sea Level Rise + Storm Surge
  - RANK: 16 / 16 STATES ASSESSED
  - SCORE: 0.000

- Storm Surge
  - RANK: 14 / 16 STATES ASSESSED
  - SCORE: 0.000

- Tropical Cyclone Wind
  - RANK: 15 / 16 STATES ASSESSED
  - SCORE: 0.000

- Earthquake
  - RANK: 6 / 16 STATES ASSESSED
  - SCORE: 0.000

- Tsunami
  - RANK: 14 / 16 STATES ASSESSED
  - SCORE: 0.000

- Landslide
  - RANK: 13 / 16 STATES ASSESSED
  - SCORE: 0.000
Koror’s score and ranking are due to Very High Multi-hazard Exposure combined with Very Low Vulnerability and Very High Coping Capacity scores.

Multi-hazard risk component scores compared to overall average country scores:

- **Multi-Hazard Exposure**: 0.733 (States) / 0.498 (Country)
- **Vulnerability**: 0.000 (States) / 0.500 (Country)
- **Coping Capacity**: 1.000 (States) / 0.513 (Country)
Better solutions. Fewer disasters.

Safer world.

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F: (808) 891-0526

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RISK AND VULNERABILITY COMPONENT SCORE

**MULTI-HAZARD RISK (MHR) - Very Low**
Score: 0.381 • Rank: 13/16

**RESILIENCE (R) - Moderate**
Score: 0.567 • Rank: 8/16

**MULTI-HAZARD EXPOSURE (MHE) - Very Low**
Score: 0.278 • Rank: 14/16

**VULNERABILITY (V) - High**
Score: 0.666 • Rank: 6/16

**COPING CAPACITY (CC) - High**
Score: 0.800 • Rank: 4/16

- Population (2020 Census): 318
- Poverty: 32.2%
- No High School Diploma: 19.2%
- Households without Internet: 57.5%
- Temporary Structures as Housing: 6.32%
MULTI-HAZARD EXPOSURE (MHE)

RANK: 14 / 16 STATES
SCORE: 0.278

ESTIMATED EXPOSURE TO EACH HAZARD:

- **Sea Level Rise**: 42.8%
  - Critical Infrastructure Exposed: 28.8%
  - Population: 136

- **Tsunami**: 10.1%
  - Critical Infrastructure Exposed: 3.0%
  - Population: 32

- **Storm Surge + Sea Level Rise**: 46.0%
  - Critical Infrastructure Exposed: 28.8%
  - Population: 146

- **Earthquake**: 0.0%
  - Critical Infrastructure Exposed: 0.0%
  - Population: 0

- **Storm Surge**: 10.5%
  - Critical Infrastructure Exposed: 3.0%
  - Population: 33

- **Landslide**: 1.3%
  - Critical Infrastructure Exposed: 0.0%
  - Population: 4

- **Tropical Cyclone Wind**: 100%
  - Critical Infrastructure Exposed: 100%
  - Population: 318
  - Financial Cost: $15.5 Million
VULNERABILITY (V)  
RANK: 6 / 16 STATES ASSESSED  
SCORE: 0.666

Vulnerability measures the conditions and processes that increase susceptibility of communities and systems to the damaging effects of hazards. Vulnerability in Melekeok is primarily driven by Socioeconomic Status and Housing Type and Transportation. The bar charts indicate the socioeconomic themes contributing to the overall Vulnerability score.

Housing Characteristics  
SCORE: 0.133  
RANK: 14/16 STATES ASSESSED

- 8.5% Households Using Biomass for Fuel
- 1.1% Households without Electricity
- 11.7% Households without Access to Public Water

Communication Assets  
SCORE: 0.133  
RANK: 14/16 STATES ASSESSED

- 10.6% Households without Cell Phone
- 55.3% Households without Computer
- 57.5% Households without Internet
- 14.9% Households without Phone
- 18.1% Households without TV

Household Composition and Disability  
SCORE: 0.600  
RANK: 7/16 STATES ASSESSED

- 17.3% Percent Disabled
- 21.4% Percent Under 18 Years of Age
- 22.3% Households with Single Mother
- 0.0% Percent Over 65 Years of Age

Socioeconomic Status  
SCORE: 0.800  
RANK: 4/16 STATES ASSESSED

- $10,002.58 Average Income (USD)
- 19.2% Percent No High School Diploma
- 5.8% Unemployment Rate
- 32.2% Population Earning Less than $5.50 per day

Housing Type and Transportation  
SCORE: 0.636  
RANK: 4/16 STATES ASSESSED

- 3.4 Median Number of Persons per Housing Unit
- 14.9% Percent of Households with No Vehicle
- 1.6% Population Living in Group Quarters
- 1.6% Institutionalized Population
- 6.3% Households Living in Temporary Structures
- 0.0% Housing Structures with 10 or more Units
Coping Capacity measures the systems, means, and abilities of people and societies to absorb and respond to disruptions in normal function. The bar charts below indicate the socioeconomic themes contributing to the overall Coping Capacity score.

**Emergency Services Capacity**

<table>
<thead>
<tr>
<th>Metric</th>
<th>Rank</th>
<th>Score</th>
<th>States Assessed</th>
</tr>
</thead>
<tbody>
<tr>
<td>Average Distance to Fire Station (mi)</td>
<td>1</td>
<td>0.934</td>
<td>2/16 States Assessed</td>
</tr>
<tr>
<td>Average Distance to Shelter (mi)</td>
<td>1</td>
<td>0.43</td>
<td></td>
</tr>
<tr>
<td>Average Distance to Health Facility (mi)</td>
<td>0</td>
<td>0.96</td>
<td></td>
</tr>
</tbody>
</table>

**Transportation Capacity**

<table>
<thead>
<tr>
<th>Metric</th>
<th>Rank</th>
<th>Score</th>
<th>States Assessed</th>
</tr>
</thead>
<tbody>
<tr>
<td>Road Density (mi per square mi)</td>
<td>1</td>
<td>0.467</td>
<td>9/16 States Assessed</td>
</tr>
<tr>
<td>Maximum Distance to Koror (mi)</td>
<td>0</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Average Distance to Port (mi)</td>
<td>0</td>
<td>0.88</td>
<td></td>
</tr>
</tbody>
</table>
RESILIENCE (R)  
RANK: 8 / 16  
STATES ASSESSED  
SCORE: 0.567

Components of resilience are independent of natural hazard exposure. This type of measure helps rank states based on their likelihood of experiencing a disruption outside of a naturally occurring event.

Below are the four thematic areas with the weakest relative scores:

- Socioeconomic Status
- Housing Type and Transportation
- Household Composition and Disability
- Transportation Capacity
KEY FACTORS INFLUENCING RESILIENCE

Socioeconomic Status
Populations experiencing socioeconomic constraints lack the necessary financial resources to adequately prepare for or recover from a natural disaster. The unemployed, low-income households, and those receiving public assistance have little to no financial buffers that would facilitate preparedness actions such as stocking extra food and supplies, support recovery actions such as repairing homes after a disaster, or fund mitigation actions that would protect their homes and property from future hazard impacts.

Housing Type and Transportation
Populations living in temporary housing are more susceptible to damage and losses resulting from hazard impacts. In addition, higher density living situations such as multi-unit housing, populations residing in group living quarters or crowded housing increase susceptibility to negative consequences as a result of hazard exposure. Populations with limited vehicle access, and especially those living in isolated areas, are more likely to experience mobility challenges during an evacuation, and have difficulty accessing needed supplies and services before, during and after a hazard event.

Household Composition and Disability
Single-parent households and those with dependent populations, such as the very young, elderly and the disabled may have more difficulty with mobilizing and evacuating in a timely fashion. The deaf or hard of hearing, for example, may not receive audible hazard alerts. Once evacuated, disabled populations and those with special needs will require additional services and care considerations in the response aftermath and during recovery. Ensure that plans and strategies include special accommodations for these populations.

Transportation Capacity
Denser and more diverse transportation networks provide more options for bringing outside resources into an impacted area and increase the ability of response stakeholders to access affected populations. Improved transportation capacity supports the ability to distribute resources before, during, and after a disaster.
HAZARD-SPECIFIC RISK (HSR)

<table>
<thead>
<tr>
<th>Hazard</th>
<th>RANK</th>
<th>States Assessed</th>
<th>Score</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sea Level Rise</td>
<td>7 / 16</td>
<td>16 States</td>
<td>0.245</td>
</tr>
<tr>
<td>Sea Level Rise + Storm Surge</td>
<td>9 / 16</td>
<td>16 States</td>
<td>0.203</td>
</tr>
<tr>
<td>Storm Surge</td>
<td>11 / 16</td>
<td>16 States</td>
<td>0.114</td>
</tr>
<tr>
<td>Tropical Cyclone Wind</td>
<td>6 / 16</td>
<td>16 States</td>
<td>0.149</td>
</tr>
<tr>
<td>Earthquake</td>
<td>6 / 16</td>
<td>16 States</td>
<td>0.000</td>
</tr>
<tr>
<td>Tsunami</td>
<td>11 / 16</td>
<td>16 States</td>
<td>0.114</td>
</tr>
<tr>
<td>Landslide</td>
<td>10 / 16</td>
<td>16 States</td>
<td>0.062</td>
</tr>
</tbody>
</table>
MULTI-HAZARD RISK (MHR)

Melekeok’s score and ranking are due to Very Low Multi-hazard Exposure combined with High Vulnerability and High Coping Capacity scores.

Multi-hazard risk component scores compared to overall average country scores:

- **Multi-Hazard Exposure**
  - States Score: 0.278
  - Country Score: 0.498

- **Vulnerability**
  - States Score: 0.666
  - Country Score: 0.500

- **Coping Capacity**
  - States Score: 0.800
  - Country Score: 0.513
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PACAU
NGARAARD

CAPITAL: ULIMANG
Area: 11 mi²

RISK AND VULNERABILITY COMPONENT SCORE

MULTI-HAZARD RISK (MHR) - Very High
Score: 0.796 • Rank: 1/16

RESILIENCE (R) - Very Low
Score: 0.267 • Rank: 13/16

MULTI-HAZARD EXPOSURE (MHE) - Very High
Score: 0.922 • Rank: 1/16

VULNERABILITY (V) - High
Score: 0.800 • Rank: 4/16

COPING CAPACITY (CC) - Low
Score: 0.334 • Rank: 11/16

Population (2020 Census)
396

Poverty
34.7%

No High School Diploma
18.2%

Households without Internet
67.2%

Temporary Structures as Housing
0.78%
MULTI-HAZARD EXPOSURE (MHE)

RANK: 1 / 16 STATES
SCORE: 0.922

ESTIMATED EXPOSURE TO EACH HAZARD:

- **Sea Level Rise**
  - 61.2%
  - 242 people
  - $186,300
  - Critical Infrastructure Exposed: 100.0%

- **Tsunami**
  - 56.2%
  - 222 people
  - $12.2 Million
  - Critical Infrastructure Exposed: 61.1%

- **Storm Surge + Sea Level Rise**
  - 72.3%
  - 286 people
  - $7.90 Million
  - Critical Infrastructure Exposed: 100.0%

- **Earthquake**
  - 98.0%
  - 388 people
  - $30.6 Million
  - Critical Infrastructure Exposed: 100.0%

- **Storm Surge**
  - 56.4%
  - 223 people
  - $12.2 Million
  - Critical Infrastructure Exposed: 61.1%

- **Landslide**
  - 45.5%
  - 180 people
  - $9.71 Million
  - Critical Infrastructure Exposed: 36.1%

- **Tropical Cyclone Wind**
  - 100%
  - 396 people
  - $30.7 Million
  - Critical Infrastructure Exposed: 100%
STATE PROFILE

VULNERABILITY (V)

Vulnerability measures the conditions and processes that increase susceptibility of communities and systems to the damaging effects of hazards. Vulnerability in Ngaraard is primarily driven by Household Composition and Disability and Housing Characteristics. The bar charts indicate the socioeconomic themes contributing to the overall Vulnerability score.

RANK: 4 / 16 STATES ASSESSED
SCORE: 0.800

Housing Characteristics

0
1
SCORE: 0.533
RANK: 8/16 STATES ASSESSED

14.1% Households Using Biomass for Fuel
3.1% Households without Electricity
10.2% Households without Access to Public Water

Communication Assets

0
1
SCORE: 0.533
RANK: 8/16 STATES ASSESSED

12.5% Households without Cell Phone
70.3% Households without Computer
67.2% Households without Internet
16.4% Households without Phone
24.2% Households without TV

Household Composition and Disability

0
1
SCORE: 0.933
RANK: 2/16 STATES ASSESSED

12.4% Percent Disabled
26.5% Percent Under 18 Years of Age
33.6% Households with Single Mother
26.6% Percent Over 65 Years of Age

Socioeconomic Status

0
1
SCORE: 0.466
RANK: 9/16 STATES ASSESSED

$8,343.86 Average Income (USD)
18.2% Percent No High School Diploma
2.0% Unemployment Rate
34.7% Population Earning Less than $5.50 per day

Housing Type and Transportation

0
1
SCORE: 0.307
RANK: 9/16 STATES ASSESSED

3.3 Median Number of Persons per Housing Unit
17.2% Percent of Households with No Vehicle
0.3% Population Living in Group Quarters
0.3% Institutionalized Population
0.8% Households Living in Temporary Structures
0.0% Housing Structures with 10 or more Units
COPING CAPACITY (CC)  
RANK: 11 / 16 STATES ASSESSED  
SCORE: 0.334

Coping Capacity measures the systems, means, and abilities of people and societies to absorb and respond to disruptions in normal function. The bar charts below indicate the socioeconomic themes contributing to the overall Coping Capacity score.

Emergency Services Capacity

- Average Distance to Fire Station (mi): 5.08
- Average Distance to Shelter (mi): 0.91
- Average Distance to Health Facility (mi): 4.27

Score: 0.400  
Rank: 10 / 16 States Assessed

Transportation Capacity

- Road Density (mi per square mi): 1.69
- Maximum Distance to Koror (mi): 14
- Average Distance to Port (mi): 1.72

Score: 0.400  
Rank: 10 / 16 States Assessed
RESILIENCE (R)  RANK: 13 / 16 STATES ASSESSED  
SCORE: 0.267

Components of resilience are independent of natural hazard exposure. This type of measure helps rank states based on their likelihood of experiencing a disruption outside of a naturally occurring event.

Below are the four thematic areas with the weakest relative scores:

- Household Composition and Disability
- Housing Characteristics
- Emergency Services Capacity
- Transportation Capacity
KEY FACTORS INFLUENCING RESILIENCE

Household Composition and Disability
Single-parent households and those with dependent populations, such as the very young, elderly and the disabled may have more difficulty with mobilizing and evacuating in a timely fashion. The deaf or hard of hearing, for example, may not receive audible hazard alerts. Once evacuated, disabled populations and those with special needs will require additional services and care considerations in the response aftermath and during recovery. Ensure that plans and strategies include special accommodations for these populations.

Housing Characteristics
Households experiencing access constraints with regard to information, clean water and energy are challenged to maintain a standard of living that meets basic household needs. Facing significant demands on daily routines effectively limit response and recovery capacity and the ability to maintain livelihoods. Limited communications assets, such as no telephone service or access to the internet can impede the ability of households to receive and act upon urgent hazard warning information.

Emergency Services Capacity
Societies establish capacities to manage emergencies that scale from day-to-day events up to catastrophes that impact all of society. Establishing and maintaining a broad range of systems and resources to support emergency services will increase the capacity for disaster management and response.

Transportation Capacity
Denser and more diverse transportation networks provide more options for bringing outside resources into an impacted area and increase the ability of response stakeholders to access affected populations. Improved transportation capacity supports the ability to distribute resources before, during, and after a disaster.
HAZARD-SPECIFIC RISK (HSR)

- **Sea Level Rise**: RANK: 3 / 16 STATES ASSESSED, SCORE: 0.393
- **Sea Level Rise + Storm Surge**: RANK: 1 / 16 STATES ASSESSED, SCORE: 0.543
- **Storm Surge**: RANK: 1 / 16 STATES ASSESSED, SCORE: 0.604
- **Tropical Cyclone Wind**: RANK: 2 / 16 STATES ASSESSED, SCORE: 0.277
- **Earthquake**: RANK: 1 / 16 STATES ASSESSED, SCORE: 0.676
- **Tsunami**: RANK: 1 / 16 STATES ASSESSED, SCORE: 0.604
- **Landslide**: RANK: 2 / 16 STATES ASSESSED, SCORE: 0.568
MULTI-HAZARD RISK (MHR)

Ngaraard’s score and ranking are due to Very High Multi-hazard Exposure combined with High Vulnerability and Low Coping Capacity scores.

Multi-hazard risk component scores compared to overall average country scores:

- **Multi-Hazard Exposure**: 0.922 (States) / 0.498 (Country)
- **Vulnerability**: 0.800 (States) / 0.500 (Country)
- **Coping Capacity**: 0.334 (States) / 0.513 (Country)
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PALAU
NGARCHELONG
CAPITAL: MENGELLANG
Area: 3 mi²

RISK AND VULNERABILITY COMPONENT SCORE

- **MULTI-HAZARD RISK (MHR)** - Moderate
  Score: 0.485 • Rank: 9/16

- **RESILIENCE (R)** - Moderate
  Score: 0.601 • Rank: 6/16

- **MULTI-HAZARD EXPOSURE (MHE)** - High
  Score: 0.655 • Rank: 5/16

- **VULNERABILITY (V)** - Moderate
  Score: 0.533 • Rank: 8/16

- **COPING CAPACITY (CC)** - High
  Score: 0.734 • Rank: 5/16

- Population (2020 Census) 384
- Poverty 35.4%
- No High School Diploma 12.0%
- Households without Internet 59.3%
- Temporary Structures as Housing 3.54%
MULTI-HAZARD EXPOSURE (MHE)

RANK: 5 / 16 STATES
SCORE: 0.655

ESTIMATED EXPOSURE TO EACH HAZARD:

- **Sea Level Rise**: 4.7%
  - 18
  - Critical Infrastructure Exposed: 16.7%

- **Tsunami**: 4.0%
  - 15
  - $4.56 Million
  - Critical Infrastructure Exposed: 31.9%

- **Storm Surge + Sea Level Rise**: 9.2%
  - 35
  - $6.93 Million
  - Critical Infrastructure Exposed: 37.5%

- **Earthquake**: 100.0%
  - 384
  - $11.5 Million
  - Critical Infrastructure Exposed: 100.0%

- **Storm Surge**: 4.1%
  - 16
  - $4.56 Million
  - Critical Infrastructure Exposed: 31.9%

- **Landslide**: 5.8%
  - 22
  - Critical Infrastructure Exposed: 4.2%

- **Tropical Cyclone Wind**: 100%
  - 384
  - $11.9 Million
  - Critical Infrastructure Exposed: 100%
VULNERABILITY (V)

RANK: 8 / 16 STATES ASSESSED
SCORE: 0.533

Vulnerability measures the conditions and processes that increase susceptibility of communities and systems to the damaging effects of hazards. Vulnerability in Ngarchelong is primarily driven by Household Composition and Disability and Socioeconomic Status. The bar charts indicate the socioeconomic themes contributing to the overall Vulnerability score.

Housing Characteristics

RANK: 11/16 STATES ASSESSED
SCORE: 0.333

- 23.9% Households Using Biomass for Fuel
- 2.7% Households without Electricity
- 3.5% Households without Access to Public Water

Communication Assets

RANK: 9/16 STATES ASSESSED
SCORE: 0.466

- 8.0% Households without Cell Phone
- 62.8% Households without Computer
- 59.3% Households without Internet
- 15.9% Households without Phone
- 31.0% Households without TV

Household Composition and Disability

RANK: 1/16 STATES ASSESSED
SCORE: 1.000

- 22.9% Percent Disabled
- 27.3% Percent Under 18 Years of Age
- 23.7% Households with Single Mother
- 46.6% Percent Over 65 Years of Age

Socioeconomic Status

RANK: 5/16 STATES ASSESSED
SCORE: 0.733

- $8,059.72 Average Income (USD)
- 12.0% Percent No High School Diploma
- 5.8% Unemployment Rate
- 35.4% Population Earning Less than $5.50 per day

Housing Type and Transportation

RANK: 13/16 STATES ASSESSED
SCORE: 0.000

- 3.4 Median Number of Persons per Housing Unit
- 13.3% Percent of Households with No Vehicle
- 0.0% Population Living in Group Quarters
- 3.5% Households Living in Temporary Structures
- 0.0% Housing Structures with 10 or more Units
COPING CAPACITY (CC) RANK: 5 / 16 STATES ASSESSED
SCORE: 0.734

Coping Capacity measures the systems, means, and abilities of people and societies to absorb and respond to disruptions in normal function. The bar charts below indicate the socioeconomic themes contributing to the overall Coping Capacity score.

Emergency Services Capacity

SCORE: 0.734 RANK: 5/16 STATES ASSESSED

<table>
<thead>
<tr>
<th>Metric</th>
<th>Rank</th>
<th>Score</th>
</tr>
</thead>
<tbody>
<tr>
<td>Average Distance to Fire Station (mi)</td>
<td>0</td>
<td>8.26</td>
</tr>
<tr>
<td>Average Distance to Shelter (mi)</td>
<td>1</td>
<td>0.29</td>
</tr>
<tr>
<td>Average Distance to Health Facility (mi)</td>
<td>1</td>
<td>0.78</td>
</tr>
</tbody>
</table>

Transportation Capacity

SCORE: 0.600 RANK: 7/16 STATES ASSESSED

<table>
<thead>
<tr>
<th>Metric</th>
<th>Rank</th>
<th>Score</th>
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</thead>
<tbody>
<tr>
<td>Road Density (mi per square mi)</td>
<td>0</td>
<td>1.74</td>
</tr>
<tr>
<td>Maximum Distance to Koror (mi)</td>
<td>1</td>
<td>19</td>
</tr>
<tr>
<td>Average Distance to Port (mi)</td>
<td>1</td>
<td>0.58</td>
</tr>
</tbody>
</table>
RESILIENCE (R)  
RANK: 6 / 16  STATES ASSESSED  
SCORE: 0.601

Components of resilience are independent of natural hazard exposure. This type of measure helps rank states based on their likelihood of experiencing a disruption outside of a naturally occurring event.

Below are the four thematic areas with the weakest relative scores:

Household Composition and Disability  
Socioeconomic Status  
Transportation Capacity  
Housing Characteristics
KEY FACTORS INFLUENCING RESILIENCE

Household Composition and Disability
Single-parent households and those with dependent populations, such as the very young, elderly and the disabled may have more difficulty with mobilizing and evacuating in a timely fashion. The deaf or hard of hearing, for example, may not receive audible hazard alerts. Once evacuated, disabled populations and those with special needs will require additional services and care considerations in the response aftermath and during recovery. Ensure that plans and strategies include special accommodations for these populations.

Socioeconomic Status
Populations experiencing socioeconomic constraints lack the necessary financial resources to adequately prepare for or recover from a natural disaster. The unemployed, low-income households, and those receiving public assistance have little to no financial buffers that would facilitate preparedness actions such as stocking extra food and supplies, support recovery actions such as repairing homes after a disaster, or fund mitigation actions that would protect their homes and property from future hazard impacts.

Transportation Capacity
Denser and more diverse transportation networks provide more options for bringing outside resources into an impacted area and increase the ability of response stakeholders to access affected populations. Improved transportation capacity supports the ability to distribute resources before, during, and after a disaster.

Housing Characteristics
Households experiencing access constraints with regard to information, clean water and energy are challenged to maintain a standard of living that meets basic household needs. Facing significant demands on daily routines effectively limit response and recovery capacity and the ability to maintain livelihoods. Limited communications assets, such as no telephone service or access to the internet can impede the ability of households to receive and act upon urgent hazard warning information.
HAZARD-SPECIFIC RISK (HSR)

- **Sea Level Rise**: RANK: 12 / 16 STATES ASSESSED, SCORE: 0.140
- **Sea Level Rise + Storm Surge**: RANK: 13 / 16 STATES ASSESSED, SCORE: 0.125
- **Storm Surge**: RANK: 8 / 16 STATES ASSESSED, SCORE: 0.170
- **Tropical Cyclone Wind**: RANK: 7 / 16 STATES ASSESSED, SCORE: 0.124
- **Earthquake**: RANK: 3 / 16 STATES ASSESSED, SCORE: 0.364
- **Tsunami**: RANK: 8 / 16 STATES ASSESSED, SCORE: 0.175
- **Landslide**: RANK: 8 / 16 STATES ASSESSED, SCORE: 0.158
Multi-hazard risk component scores compared to overall average country scores:

- **Multi-Hazard Exposure**
  - States Score: 0.655
  - Country Score: 0.498

- **Vulnerability**
  - States Score: 0.533
  - Country Score: 0.500

- **Coping Capacity**
  - States Score: 0.734
  - Country Score: 0.513

Ngarchelong’s score and ranking are due to High Multi-hazard Exposure combined with Moderate Vulnerability and High Coping Capacity scores.
RISK AND VULNERABILITY COMPONENT SCORE

**MULTI-HAZARD RISK (MHR) - Low**
Score: 0.477  •  Rank: 10/16

**RESILIENCE (R) - Moderate**
Score: 0.601  •  Rank: 6/16

**MULTI-HAZARD EXPOSURE (MHE) - Moderate**
Score: 0.633  •  Rank: 6/16

**VULNERABILITY (V) - Low**
Score: 0.266  •  Rank: 12/16

**COPING CAPACITY (CC) - Low**
Score: 0.467  •  Rank: 9/16

**Population (2020 Census)**
238

**Poverty**
26.4%

**No High School Diploma**
29.6%

**Households without Internet**
71.8%

**Temporary Structures as Housing**
1.41%
MULTI-HAZARD EXPOSURE (MHE)

RANK: 6 / 16 STATES
SCORE: 0.633

ESTIMATED EXPOSURE TO EACH HAZARD:

- **Sea Level Rise**: 22.0%
  - 52
  - $3.78 Million
  - Critical Infrastructure Exposed: 33.3%

- **Tsunami**: 4.9%
  - 12
  - $3.78 Million
  - Critical Infrastructure Exposed: 16.7%

- **Storm Surge + Sea Level Rise**: 31.3%
  - 75
  - $3.78 Million
  - Critical Infrastructure Exposed: 33.3%

- **Earthquake**: 100.0%
  - 238
  - $3.78 Million
  - Critical Infrastructure Exposed: 100.0%

- **Storm Surge**: 5.0%
  - 12
  - $3.78 Million
  - Critical Infrastructure Exposed: 16.7%

- **Landslide**: 36.6%
  - 87
  - $3.78 Million
  - Critical Infrastructure Exposed: 66.7%

- **Tropical Cyclone Wind**: 100%
  - 238
  - $3.78 Million
  - Critical Infrastructure Exposed: 100%
VULNERABILITY (V)

Score: 0.266

Vulnerability measures the conditions and processes that increase susceptibility of communities and systems to the damaging effects of hazards. Vulnerability in Ngardmau is primarily driven by Socioeconomic Status and Housing Type and Transportation. The bar charts indicate the socioeconomic themes contributing to the overall Vulnerability score.

Housing Characteristics

- 7.0% Households Using Biomass for Fuel
- 1.4% Households without Electricity
- 7.0% Households without Access to Public Water

Score: 0.266

RANK: 12/16 STATES ASSESSED

Communication Assets

- 18.3% Households without Cell Phone
- 66.2% Households without Computer
- 71.8% Households without Internet
- 32.4% Households without Phone
- 26.8% Households without TV

Score: 0.866

RANK: 3/16 STATES ASSESSED

Household Composition and Disability

- 8.0% Percent Disabled
- 26.9% Percent Under 18 Years of Age
- 16.7% Households with Single Mother
- 13.3% Percent Over 65 Years of Age

Score: 0.133

RANK: 14/16 STATES ASSESSED

Socioeconomic Status

- $7,579.30 Average Income (USD)
- 29.6% Percent No High School Diploma
- 2.8% Unemployment Rate
- 26.4% Population Earning Less than $5.50 per day

Score: 0.866

RANK: 3/16 STATES ASSESSED

Housing Type and Transportation

- 3.6 Median Number of Persons per Housing Unit
- 22.5% Percent of Households with No Vehicle
- 0.0% Population Living in Group Quarters
- 1.4% Households Living in Temporary Structures
- 0.0% Housing Structures with 10 or more Units

Score: 0.333

RANK: 7/16 STATES ASSESSED
COPING CAPACITY (CC)  
**RANK: 9 / 16 STATES ASSESSED**  
**SCORE: 0.467**

Coping Capacity measures the systems, means, and abilities of people and societies to absorb and respond to disruptions in normal function. The bar charts below indicate the socioeconomic themes contributing to the overall Coping Capacity score.

### Emergency Services Capacity

- **Score: 0.534**  
- **Rank: 8/16 States Assessed**

- **Average Distance to Fire Station (mi):** 1.19  
- **Average Distance to Shelter (mi):** 0.59  
- **Average Distance to Health Facility (mi):** 5.69

### Transportation Capacity

- **Score: 0.334**  
- **Rank: 11/16 States Assessed**

- **Road Density (mi per square mi):** 0.53  
- **Maximum Distance to Koror (mi):** 11  
- **Average Distance to Port (mi):** 0.85
RESILIENCE (R)  
RANK: 6 / 16  STATES ASSESSED  
SCORE: 0.601  

Components of resilience are independent of natural hazard exposure. This type of measure helps rank states based on their likelihood of experiencing a disruption outside of a naturally occurring event.

Below are the four thematic areas with the weakest relative scores:

- Socioeconomic Status
- Housing Type and Transportation
- Transportation Capacity
- Emergency Services Capacity
KEY FACTORS INFLUENCING RESILIENCE

Socioeconomic Status
Populations experiencing socioeconomic constraints lack the necessary financial resources to adequately prepare for or recover from a natural disaster. The unemployed, low-income households, and those receiving public assistance have little to no financial buffers that would facilitate preparedness actions such as stocking extra food and supplies, support recovery actions such as repairing homes after a disaster, or fund mitigation actions that would protect their homes and property from future hazard impacts.

Housing Type and Transportation
Populations living in temporary housing are more susceptible to damage and losses resulting from hazard impacts. In addition, higher density living situations such as multi-unit housing, populations residing in group living quarters or crowded housing increase susceptibility to negative consequences as a result of hazard exposure. Populations with limited vehicle access, and especially those living in isolated areas, are more likely to experience mobility challenges during an evacuation, and have difficulty accessing needed supplies and services before, during and after a hazard event.

Transportation Capacity
Denser and more diverse transportation networks provide more options for bringing outside resources into an impacted area and increase the ability of response stakeholders to access affected populations. Improved transportation capacity supports the ability to distribute resources before, during, and after a disaster.

Emergency Services Capacity
Societies establish capacities to manage emergencies that scale from day-to-day events up to catastrophes that impact all of society. Establishing and maintaining a broad range of systems and resources to support emergency services will increase the capacity for disaster management and response.
HAZARD-SPECIFIC RISK (HSR)

- **Sea Level Rise**
  - **RANK:** 8 / 16 STATES ASSESSED
  - **SCORE:** 0.229

- **Sea Level Rise + Storm Surge**
  - **RANK:** 12 / 16 STATES ASSESSED
  - **SCORE:** 0.150

- **Storm Surge**
  - **RANK:** 10 / 16 STATES ASSESSED
  - **SCORE:** 0.162

- **Tropical Cyclone Wind**
  - **RANK:** 12 / 16 STATES ASSESSED
  - **SCORE:** 0.049

- **Earthquake**
  - **RANK:** 5 / 16 STATES ASSESSED
  - **SCORE:** 0.346

- **Tsunami**
  - **RANK:** 10 / 16 STATES ASSESSED
  - **SCORE:** 0.162

- **Landslide**
  - **RANK:** 5 / 16 STATES ASSESSED
  - **SCORE:** 0.294
Ngardmau’s score and ranking are due to Moderate Multi-hazard Exposure combined with Low Vulnerability and Low Coping Capacity scores.
RISK AND VULNERABILITY COMPONENT SCORE

**MULTI-HAZARD RISK (MHR)** - Moderate
Score: 0.496  •  Rank: 8/16

**RESILIENCE (R)** - Low
Score: 0.434  •  Rank: 11/16

**MULTI-HAZARD EXPOSURE (MHE)** - Very Low
Score: 0.355  •  Rank: 13/16

**VULNERABILITY (V)** - Low
Score: 0.333  •  Rank: 11/16

**COPING CAPACITY (CC)** - Very Low
Score: 0.200  •  Rank: 13/16

Population (2020 Census) 349
Poverty 24.4%
No High School Diploma 19.8%
Households without Internet 50.5%
Temporary Structures as Housing 6.73%
MULTI-HAZARD EXPOSURE (MHE)

RANK: 13 / 16 STATES
SCORE: 0.355

ESTIMATED EXPOSURE TO EACH HAZARD:

- **Sea Level Rise** 8.6%
  - People: 30
  - Cost: $705,000
  - Critical Infrastructure Exposed: 16.7%

- **Tsunami** 13.1%
  - People: 46
  - Critical Infrastructure Exposed: 16.7%

- **Storm Surge + Sea Level Rise** 15.8%
  - People: 55
  - Cost: $705,000
  - Critical Infrastructure Exposed: 16.7%

- **Earthquake** 1.2%
  - People: 4
  - Cost: $4.00 Million
  - Critical Infrastructure Exposed: 5.6%

- **Storm Surge** 15.5%
  - People: 54
  - Critical Infrastructure Exposed: 16.7%

- **Landslide** 17.2%
  - People: 60
  - Cost: $11.8 Million
  - Critical Infrastructure Exposed: 16.7%

- **Tropical Cyclone Wind** 100%
  - People: 349
  - Cost: $12.5 Million
  - Critical Infrastructure Exposed: 100%
Vulnerability measures the conditions and processes that increase susceptibility of communities and systems to the damaging effects of hazards. Vulnerability in Ngaremlengui is primarily driven by Socioeconomic Status and Housing Characteristics. The bar charts indicate the socioeconomic themes contributing to the overall Vulnerability score.
Coping Capacity measures the systems, means, and abilities of people and societies to absorb and respond to disruptions in normal function. The bar charts below indicate the socioeconomic themes contributing to the overall Coping Capacity score.

**Emergency Services Capacity**

<table>
<thead>
<tr>
<th>Metric</th>
<th>Value</th>
<th>Rank</th>
</tr>
</thead>
<tbody>
<tr>
<td>Average Distance to Fire Station (mi)</td>
<td>6.14</td>
<td></td>
</tr>
<tr>
<td>Average Distance to Shelter (mi)</td>
<td>1.06</td>
<td></td>
</tr>
<tr>
<td>Average Distance to Health Facility (mi)</td>
<td>2.41</td>
<td></td>
</tr>
</tbody>
</table>

**Transportation Capacity**

<table>
<thead>
<tr>
<th>Metric</th>
<th>Value</th>
<th>Rank</th>
</tr>
</thead>
<tbody>
<tr>
<td>Road Density (mi per square mi)</td>
<td>0.64</td>
<td></td>
</tr>
<tr>
<td>Maximum Distance to Koror (mi)</td>
<td>8</td>
<td></td>
</tr>
<tr>
<td>Average Distance to Port (mi)</td>
<td>1.79</td>
<td></td>
</tr>
</tbody>
</table>
Below are the four thematic areas with the weakest relative scores:

- Socioeconomic Status
- Housing Characteristics
- Transportation Capacity
- Emergency Services Capacity
KEY FACTORS INFLUENCING RESILIENCE

Socioeconomic Status
Populations experiencing socioeconomic constraints lack the necessary financial resources to adequately prepare for or recover from a natural disaster. The unemployed, low-income households, and those receiving public assistance have little to no financial buffers that would facilitate preparedness actions such as stocking extra food and supplies, support recovery actions such as repairing homes after a disaster, or fund mitigation actions that would protect their homes and property from future hazard impacts.

Housing Characteristics
Households experiencing access constraints with regard to information, clean water and energy are challenged to maintain a standard of living that meets basic household needs. Facing significant demands on daily routines effectively limit response and recovery capacity and the ability to maintain livelihoods. Limited communications assets, such as no telephone service or access to the internet can impede the ability of households to receive and act upon urgent hazard warning information.

Transportation Capacity
Denser and more diverse transportation networks provide more options for bringing outside resources into an impacted area and increase the ability of response stakeholders to access affected populations. Improved transportation capacity supports the ability to distribute resources before, during, and after a disaster.

Emergency Services Capacity
Societies establish capacities to manage emergencies that scale from day-to-day events up to catastrophes that impact all of society. Establishing and maintaining a broad range of systems and resources to support emergency services will increase the capacity for disaster management and response.
HAZARD-SPECIFIC RISK (HSR)

- **Sea Level Rise**
  - **Rank:** 10 / 16 States Assessed
  - **Score:** 0.207

- **Sea Level Rise + Storm Surge**
  - **Rank:** 10 / 16 States Assessed
  - **Score:** 0.167

- **Storm Surge**
  - **Rank:** 6 / 16 States Assessed
  - **Score:** 0.255

- **Tropical Cyclone Wind**
  - **Rank:** 4 / 16 States Assessed
  - **Score:** 0.189

- **Earthquake**
  - **Rank:** 2 / 16 States Assessed
  - **Score:** 0.422

- **Tsunami**
  - **Rank:** 5 / 16 States Assessed
  - **Score:** 0.255

- **Landslide**
  - **Rank:** 4 / 16 States Assessed
  - **Score:** 0.384
Ngaremlengui’s score and ranking are due to Very Low Multi-hazard Exposure combined with Low Vulnerability and Very Low Coping Capacity scores.

Multi-hazard risk component scores compared to overall average country scores:
Safer world.
PALAU
NGATPANG
NDPBA SUBNATIONAL PROFILE

©2023 Pacific Disaster Center
PALAU
NGATPANG
CAPITAL: NGEREKLMADEL
Area: 14 mi²

RISK AND VULNERABILITY COMPONENT SCORE

**MULTI-HAZARD RISK (MHR) - Very High**
Score: 0.733 • Rank: 2/16

**RESILIENCE (R) - Very Low**
Score: 0.134 • Rank: 15/16

**MULTI-HAZARD EXPOSURE (MHE) - Low**
Score: 0.466 • Rank: 11/16

**VULNERABILITY (V) - Very High**
Score: 0.933 • Rank: 2/16

**COPING CAPACITY (CC) - Very Low**
Score: 0.200 • Rank: 13/16

Population (2020 Census): 289
Poverty: 22.2%
No High School Diploma: 22.2%
Households without Internet: 56.8%
Temporary Structures as Housing: 17.72%
MULTI-HAZARD EXPOSURE (MHE)

RANK: 11 / 16 STATES
SCORE: 0.466

ESTIMATED EXPOSURE TO EACH HAZARD:

- **Sea Level Rise** 16.1%
  - Critical Infrastructure Exposed: 29.2%
  - 47 people
  - $11.7 Million

- **Tsunami** 3.2%
  - Critical Infrastructure Exposed: 6.3%
  - 9 people

- **Storm Surge + Sea Level Rise** 16.9%
  - Critical Infrastructure Exposed: 35.4%
  - 49 people
  - $11.8 Million

- **Earthquake** 0.0%
  - Critical Infrastructure Exposed: 0.0%
  - 0 people
  - $0

- **Storm Surge** 3.2%
  - Critical Infrastructure Exposed: 6.3%
  - 9 people

- **Landslide** 39.6%
  - Critical Infrastructure Exposed: 47.9%
  - 115 people
  - $7.30 Million

- **Tropical Cyclone Wind** 100%
  - Critical Infrastructure Exposed: 100%
  - 289 people
  - $19.1 Million
VULNERABILITY (V)

**RANK: 2 / 16 STATES ASSESSED**
**SCORE: 0.933**

Vulnerability measures the conditions and processes that increase susceptibility of communities and systems to the damaging effects of hazards. Vulnerability in Ngatpang is primarily driven by Housing Type and Transportation and Housing Characteristics. The bar charts indicate the socioeconomic themes contributing to the overall Vulnerability score.

### Housing Characteristics

- **48.7%** Households Using Biomass for Fuel
- **4.1%** Households without Access to Public Water
- **21.6%** Households without Electricity

**SCORE: 0.933**
**RANK: 2/16 STATES ASSESSED**

### Communication Assets

- **5.4%** Households without Cell Phone
- **63.5%** Households without Computer
- **56.8%** Households without Internet
- **33.8%** Households without Phone
- **40.5%** Households without TV

**SCORE: 0.666**
**RANK: 6/16 STATES ASSESSED**

### Household Composition and Disability

- **6.2%** Percent Disabled
- **23.2%** Under 18 Years of Age
- **20.0%** Households with Single Mother
- **40.0%** Over 65 Years of Age

**SCORE: 0.200**
**RANK: 13/16 STATES ASSESSED**

### Socioeconomic Status

- **$7,402.26** Average Income (USD)
- **22.2%** Percent No High School Diploma
- **6.6%** Unemployment Rate
- **22.2%** Population Earning Less than $5.50 per day

**SCORE: 0.400**
**RANK: 10/16 STATES ASSESSED**

### Housing Type and Transportation

- **3.5** Median Number of Persons per Housing Unit
- **18.9%** Percent of Households with No Vehicle
- **3.1%** Population Living in Group Quarters
- **3.1%** Institutionalized Population
- **17.7%** Households Living in Temporary Structures
- **0.0%** Housing Structures with 10 or more Units

**SCORE: 1.000**
**RANK: 1/16 STATES ASSESSED**
Coping Capacity measures the systems, means, and abilities of people and societies to absorb and respond to disruptions in normal function. The bar charts below indicate the socioeconomic themes contributing to the overall Coping Capacity score.

**Emergency Services Capacity**

- Average Distance to Fire Station (mi): 7.32
- Average Distance to Shelter (mi): 0.71
- Average Distance to Health Facility (mi): 4.73

**Transportation Capacity**

- Road Density (mi per square mi): 0.74
- Maximum Distance to Koror (mi): 6
- Average Distance to Port (mi): 2.16
RESILIENCE (R)  
RANK: 15 / 16 STATES ASSESSED  
SCORE: 0.134

Components of resilience are independent of natural hazard exposure. This type of measure helps rank states based on their likelihood of experiencing a disruption outside of a naturally occurring event.

Below are the four thematic areas with the weakest relative scores:

- Housing Type and Transportation
- Housing Characteristics
- Emergency Services Capacity
- Transportation Capacity
KEY FACTORS INFLUENCING RESILIENCE

Housing Type and Transportation
Populations living in temporary housing are more susceptible to damage and losses resulting from hazard impacts. In addition, higher density living situations such as multi-unit housing, populations residing in group living quarters or crowded housing increase susceptibility to negative consequences as a result of hazard exposure. Populations with limited vehicle access, and especially those living in isolated areas, are more likely to experience mobility challenges during an evacuation, and have difficulty accessing needed supplies and services before, during and after a hazard event.

Housing Characteristics
Households experiencing access constraints with regard to information, clean water and energy are challenged to maintain a standard of living that meets basic household needs. Facing significant demands on daily routines effectively limit response and recovery capacity and the ability to maintain livelihoods. Limited communications assets, such as no telephone service or access to the internet can impede the ability of households to receive and act upon urgent hazard warning information.

Emergency Services Capacity
Societies establish capacities to manage emergencies that scale from day-to-day events up to catastrophes that impact all of society. Establishing and maintaining a broad range of systems and resources to support emergency services will increase the capacity for disaster management and response.

Transportation Capacity
Denser and more diverse transportation networks provide more options for bringing outside resources into an impacted area and increase the ability of response stakeholders to access affected populations. Improved transportation capacity supports the ability to distribute resources before, during, and after a disaster.
HAZARD-SPECIFIC RISK (HSR)

- **Sea Level Rise**
  - RANK: 1 / 16 STATES ASSESSED
  - SCORE: 0.557

- **Sea Level Rise + Storm Surge**
  - RANK: 6 / 16 STATES ASSESSED
  - SCORE: 0.313

- **Storm Surge**
  - RANK: 9 / 16 STATES ASSESSED
  - SCORE: 0.162

- **Tropical Cyclone Wind**
  - RANK: 1 / 16 STATES ASSESSED
  - SCORE: 0.288

- **Earthquake**
  - RANK: 6 / 16 STATES ASSESSED
  - SCORE: 0.000

- **Tsunami**
  - RANK: 9 / 16 STATES ASSESSED
  - SCORE: 0.162

- **Landslide**
  - RANK: 1 / 16 STATES ASSESSED
  - SCORE: 0.654
MULTI-HAZARD RISK (MHR)

Ngatpang's score and ranking are due to Low Multi-hazard Exposure combined with Very High Vulnerability and Very Low Coping Capacity scores.

**Multi-hazard risk component scores compared to overall average country scores:**

- **Multi-Hazard Exposure**
  - States Score: 0.466
  - Country Score: 0.498

- **Vulnerability**
  - States Score: 0.933
  - Country Score: 0.500

- **Coping Capacity**
  - States Score: 0.200
  - Country Score: 0.513

Score: 0.733
RISK AND VULNERABILITY COMPONENT SCORE

- **MULTI-HAZARD RISK (MHR)** - High
  Score: 0.596  •  Rank: 4/16

- **RESILIENCE (R)** - Low
  Score: 0.334  •  Rank: 12/16

- **MULTI-HAZARD EXPOSURE (MHE)** - Low
  Score: 0.455  •  Rank: 12/16

- **VULNERABILITY (V)** - Very High
  Score: 1.000  •  Rank: 1/16

- **COPING CAPACITY (CC)** - Moderate
  Score: 0.667  •  Rank: 6/16

- **Population (2020 Census)**
  319

- **Poverty**
  38.6%

- **No High School Diploma**
  19.8%

- **Households without Internet**
  67.3%

- **Temporary Structures as Housing**
  7.92%
## Multi-Hazard Exposure (MHE)

**Rank:** 12 / 16 States  
**Score:** 0.455

### Estimated Exposure to Each Hazard:

<table>
<thead>
<tr>
<th>Hazard</th>
<th>Percentage</th>
<th>Critical Infrastructure Exposed</th>
<th>Estimated Exposure</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sea Level Rise</td>
<td>51.6%</td>
<td>42.9%</td>
<td>$370,200</td>
</tr>
<tr>
<td>Tsunami</td>
<td>17.7%</td>
<td>9.5%</td>
<td>-</td>
</tr>
<tr>
<td>Storm Surge + Sea Level Rise</td>
<td>53.4%</td>
<td>42.9%</td>
<td>$370,200</td>
</tr>
<tr>
<td>Earthquake</td>
<td>0.0%</td>
<td>0.0%</td>
<td>$0</td>
</tr>
<tr>
<td>Storm Surge</td>
<td>20.6%</td>
<td>9.5%</td>
<td>-</td>
</tr>
<tr>
<td>Landslide</td>
<td>60.8%</td>
<td>57.1%</td>
<td>$370,200</td>
</tr>
<tr>
<td>Tropical Cyclone Wind</td>
<td>100%</td>
<td>100%</td>
<td>$12.3 Million</td>
</tr>
</tbody>
</table>
VULNERABILITY (V)

Vulnerability measures the conditions and processes that increase susceptibility of communities and systems to the damaging effects of hazards. Vulnerability in Ngchesar is primarily driven by Socioeconomic Status and Housing Characteristics. The bar charts indicate the socioeconomic themes contributing to the overall Vulnerability score.

**Housing Characteristics**

- **24.8%** Households Using Biomass for Fuel
- **4.0%** Households without Electricity
- **8.9%** Households without Access to Public Water

**Communication Assets**

- **11.9%** Households without Cell Phone
- **72.3%** Households without Computer
- **67.3%** Households without Internet
- **18.8%** Households without Phone
- **45.5%** Households without TV

**Household Composition and Disability**

- **10.7%** Percent Disabled
- **26.3%** Percent Under 18 Years of Age
- **22.8%** Households with Single Mother
- **53.3%** Percent Over 65 Years of Age

**Socioeconomic Status**

- **$11,191.30** Average Income (USD)
- **19.8%** Percent No High School Diploma
- **3.8%** Unemployment Rate
- **38.6%** Population Earning Less than $5.50 per day

**Housing Type and Transportation**

- **3.2** Median Number of Persons per Housing Unit
- **21.8%** Percent of Households with No Vehicle
- **0.0%** Population Living in Group Quarters
- **0.0%** Institutionalized Population
- **7.9%** Households Living in Temporary Structures

COPING CAPACITY (CC)  RANK: 6 / 16 STATES ASSESSED  
SCORE: 0.667

Coping Capacity measures the systems, means, and abilities of people and societies to absorb and respond to disruptions in normal function. The bar charts below indicate the socioeconomic themes contributing to the overall Coping Capacity score.

**Emergency Services Capacity**  
RANK: 9/16 STATES ASSESSED  
SCORE: 0.467

- Average Distance to Fire Station (mi): 3.01
- Average Distance to Shelter (mi): 1.19
- Average Distance to Health Facility (mi): 2.32

**Transportation Capacity**  
RANK: 5/16 STATES ASSESSED  
SCORE: 0.734

- Road Density (mi per square mi): 1.26
- Maximum Distance to Koror (mi): 6
- Average Distance to Port (mi): 0.80
Below are the four thematic areas with the weakest relative scores:

- Socioeconomic Status
- Housing Characteristics
- Household Composition and Disability
- Emergency Services Capacity
KEY FACTORS INFLUENCING RESILIENCE

Socioeconomic Status
Populations experiencing socioeconomic constraints lack the necessary financial resources to adequately prepare for or recover from a natural disaster. The unemployed, low-income households, and those receiving public assistance have little to no financial buffers that would facilitate preparedness actions such as stocking extra food and supplies, support recovery actions such as repairing homes after a disaster, or fund mitigation actions that would protect their homes and property from future hazard impacts.

Housing Characteristics
Households experiencing access constraints with regard to information, clean water and energy are challenged to maintain a standard of living that meets basic household needs. Facing significant demands on daily routines effectively limit response and recovery capacity and the ability to maintain livelihoods. Limited communications assets, such as no telephone service or access to the internet can impede the ability of households to receive and act upon urgent hazard warning information.

Household Composition and Disability
Single-parent households and those with dependent populations, such as the very young, elderly and the disabled may have more difficulty with mobilizing and evacuating in a timely fashion. The deaf or hard of hearing, for example, may not receive audible hazard alerts. Once evacuated, disabled populations and those with special needs will require additional services and care considerations in the response aftermath and during recovery. Ensure that plans and strategies include special accommodations for these populations.

Emergency Services Capacity
Societies establish capacities to manage emergencies that scale from day-to-day events up to catastrophes that impact all of society. Establishing and maintaining a broad range of systems and resources to support emergency services will increase the capacity for disaster management and response.
HAZARD-SPECIFIC RISK (HSR)

- **Sea Level Rise**: RANK: 4 / 16 STATES ASSESSED, SCORE: 0.315
- **Sea Level Rise + Storm Surge**: RANK: 5 / 16 STATES ASSESSED, SCORE: 0.335
- **Storm Surge**: RANK: 4 / 16 STATES ASSESSED, SCORE: 0.324
- **Tropical Cyclone Wind**: RANK: 5 / 16 STATES ASSESSED, SCORE: 0.177
- **Earthquake**: RANK: 6 / 16 STATES ASSESSED, SCORE: 0.000
- **Tsunami**: RANK: 4 / 16 STATES ASSESSED, SCORE: 0.324
- **Landslide**: RANK: 3 / 16 STATES ASSESSED, SCORE: 0.455
Multi-hazard risk component scores compared to overall average country scores:

- **Multi-Hazard Exposure**
  - States Score: 0.455
  - Country Score: 0.498

- **Vulnerability**
  - States Score: 1.000
  - Country Score: 0.500

- **Coping Capacity**
  - States Score: 0.667
  - Country Score: 0.513

Ngchesar’s score and ranking are due to Low Multi-hazard Exposure combined with Very High Vulnerability and Moderate Coping Capacity scores.
PALAU
NGIWAL
CAPITAL: NGERKEAI
Area: 6 mi²

RISK AND VULNERABILITY COMPONENT SCORE

- **MULTI-HAZARD RISK (MHR)** - Moderate
  Score: 0.511  •  Rank: 7/16

- **RESILIENCE (R)** - Moderate
  Score: 0.567  •  Rank: 8/16

- **MULTI-HAZARD EXPOSURE (MHE)** - High
  Score: 0.666  •  Rank: 4/16

- **VULNERABILITY (V)** - Very Low
  Score: 0.133  •  Rank: 14/16

- **COPING CAPACITY (CC)** - Low
  Score: 0.267  •  Rank: 12/16

- **Population (2020 Census)**: 312
- **Poverty**: 25.3%
- **No High School Diploma**: 13.2%
- **Households without Internet**: 48.9%
- **Temporary Structures as Housing**: 3.41%
MULTI-HAZARD EXPOSURE (MHE)

RANK: 4 / 16 STATES
SCORE: 0.666

ESTIMATED EXPOSURE TO EACH HAZARD:

- **Sea Level Rise**
  - 56.2%
  - 175
  - Critical Infrastructure Exposed: 80.0%

- **Tsunami**
  - 70.7%
  - 220
  - Critical Infrastructure Exposed: 80.0%

- **Storm Surge + Sea Level Rise**
  - 69.2%
  - 216
  - Critical Infrastructure Exposed: 90.0%

- **Earthquake**
  - 61.3%
  - 191
  - $9.30 Million
  - Critical Infrastructure Exposed: 60.0%

- **Storm Surge**
  - 70.9%
  - 221
  - Critical Infrastructure Exposed: 80.0%

- **Landslide**
  - 0.0%
  - 0
  - $1.85 Million
  - Critical Infrastructure Exposed: 0.0%

- **Tropical Cyclone Wind**
  - 100%
  - 312
  - $9.30 Million
  - Critical Infrastructure Exposed: 100%
VULNERABILITY (V)  RANK: 14 / 16 STATES ASSESSED  SCORE: 0.133

Vulnerability measures the conditions and processes that increase susceptibility of communities and systems to the damaging effects of hazards. Vulnerability in Ngiwal is primarily driven by Household Composition and Disability and Housing Characteristics. The bar charts indicate the socioeconomic themes contributing to the overall Vulnerability score.

Housing Characteristics  RANK: 13/16 STATES ASSESSED  SCORE: 0.200
- 34.1% Households Using Biomass for Fuel
- 0.0% Households without Electricity
- 63.6% Households without Access to Public Water

Communication Assets  RANK: 16/16 STATES ASSESSED  SCORE: 0.000
- 4.6% Households without Cell Phone
- 55.7% Households without Computer
- 48.9% Households without Internet
- 13.6% Households without Phone
- 23.9% Households without TV

Household Composition and Disability  RANK: 4/16 STATES ASSESSED  SCORE: 0.800
- 14.7% Percent Disabled
- 27.6% Percent Under 18 Years of Age
- 27.0% Households with Single Mother
- 80.0% Percent Over 65 Years of Age

Socioeconomic Status  RANK: 14/16 STATES ASSESSED  SCORE: 0.133
- $11,406.24 Average Income (USD)
- 13.2% Percent No High School Diploma
- 1.7% Unemployment Rate
- 25.3% Population Earning Less than $5.50 per day

Housing Type and Transportation  RANK: 13/16 STATES ASSESSED  SCORE: 0.000
- 3.6 Median Number of Persons per Housing Unit
- 10.2% Percent of Households with No Vehicle
- 0.0% Population Living in Group Quarters
- 3.4% Households Living in Temporary Structures
- 0.0% Housing Structures with 10 or more Units
COPING CAPACITY (CC)  
RANK: 12 / 16 STATES ASSESSED  
SCORE: 0.267

Coping Capacity measures the systems, means, and abilities of people and societies to absorb and respond to disruptions in normal function. The bar charts below indicate the socioeconomic themes contributing to the overall Coping Capacity score.

Emergency Services Capacity
RANK: 7/16 STATES ASSESSED  
SCORE: 0.600

- Average Distance to Fire Station (mi): 3.61
- Average Distance to Shelter (mi): 0.40
- Average Distance to Health Facility (mi): 4.42

Transportation Capacity
RANK: 14/16 STATES ASSESSED  
SCORE: 0.134

- Road Density (mi per square mi): 1.13
- Maximum Distance to Koror (mi): 11
- Average Distance to Port (mi): 4.39
RESILIENCES (R)  
RANK: 8 / 16 STATES ASSESSED  
SCORE: 0.567

Components of resilience are independent of natural hazard exposure. This type of measure helps rank states based on their likelihood of experiencing a disruption outside of a naturally occurring event.

Below are the four thematic areas with the weakest relative scores:

- Household Composition and Disability
- Housing Characteristics
- Transportation Capacity
- Emergency Services Capacity
KEY FACTORS INFLUENCING RESILIENCE

Household Composition and Disability
Single-parent households and those with dependent populations, such as the very young, elderly and the disabled may have more difficulty with mobilizing and evacuating in a timely fashion. The deaf or hard of hearing, for example, may not receive audible hazard alerts. Once evacuated, disabled populations and those with special needs will require additional services and care considerations in the response aftermath and during recovery. Ensure that plans and strategies include special accommodations for these populations.

Housing Characteristics
Households experiencing access constraints with regard to information, clean water and energy are challenged to maintain a standard of living that meets basic household needs. Facing significant demands on daily routines effectively limit response and recovery capacity and the ability to maintain livelihoods. Limited communications assets, such as no telephone service or access to the internet can impede the ability of households to receive and act upon urgent hazard warning information.

Transportation Capacity
Denser and more diverse transportation networks provide more options for bringing outside resources into an impacted area and increase the ability of response stakeholders to access affected populations. Improved transportation capacity supports the ability to distribute resources before, during, and after a disaster.

Emergency Services Capacity
Societies establish capacities to manage emergencies that scale from day-to-day events up to catastrophes that impact all of society. Establishing and maintaining a broad range of systems and resources to support emergency services will increase the capacity for disaster management and response.
HAZARD-SPECIFIC RISK (HSR)

- **Sea Level Rise**
  - **RANK:** 5 / 16 STATES ASSESSED
  - **SCORE:** 0.296

- **Sea Level Rise + Storm Surge**
  - **RANK:** 4 / 16 STATES ASSESSED
  - **SCORE:** 0.335

- **Storm Surge**
  - **RANK:** 3 / 16 STATES ASSESSED
  - **SCORE:** 0.365

- **Tropical Cyclone Wind**
  - **RANK:** 9 / 16 STATES ASSESSED
  - **SCORE:** 0.086

- **Earthquake**
  - **RANK:** 4 / 16 STATES ASSESSED
  - **SCORE:** 0.356

- **Tsunami**
  - **RANK:** 3 / 16 STATES ASSESSED
  - **SCORE:** 0.365

- **Landslide**
  - **RANK:** 11 / 16 STATES ASSESSED
  - **SCORE:** 0.058
Ngiwal's score and ranking are due to High Multi-hazard Exposure combined with Very Low Vulnerability and Low Coping Capacity scores.
Better solutions. Fewer disasters.

Safer world.

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PALAU
PELELIU

CAPITAL: KLOULKLUBED
Area: 7 mi²

RISK AND VULNERABILITY COMPONENT SCORE

MULTI-HAZARD RISK (MHR) - High
Score: 0.592 • Rank: 5/16

RESILIENCE (R) - Low
Score: 0.467 • Rank: 10/16

MULTI-HAZARD EXPOSURE (MHE) - High
Score: 0.711 • Rank: 3/16

VULNERABILITY (V) - Moderate
Score: 0.600 • Rank: 7/16

COPING CAPACITY (CC) - Moderate
Score: 0.534 • Rank: 8/16

Population (2020 Census)
470

Poverty
28.8%

No High School Diploma
38.2%

Households without Internet
63.0%

Temporary Structures as Housing
9.62%
MULTI-HAZARD EXPOSURE (MHE)

RANK: 3 / 16 STATES
SCORE: 0.711

ESTIMATED EXPOSURE TO EACH HAZARD:

- **Sea Level Rise**
  - 44.9%
  - 211
  - $4.29 Million
  - Critical Infrastructure Exposed: 22.2%

- **Tsunami**
  - 76.8%
  - 361
  - $8.00 Million
  - Critical Infrastructure Exposed: 51.9%

- **Storm Surge + Sea Level Rise**
  - 76.8%
  - 361
  - $4.29 Million
  - Critical Infrastructure Exposed: 72.2%

- **Earthquake**
  - 0.0%
  - 0
  - $0
  - Critical Infrastructure Exposed: 0.0%

- **Storm Surge**
  - 78.2%
  - 367
  - $8.00 Million
  - Critical Infrastructure Exposed: 51.9%

- **Landslide**
  - 0.5%
  - 2
  - $0
  - Critical Infrastructure Exposed: 11.1%

- **Tropical Cyclone Wind**
  - 100%
  - 470
  - $30.6 Million
  - Critical Infrastructure Exposed: 100%
Vulnerability measures the conditions and processes that increase susceptibility of communities and systems to the damaging effects of hazards. Vulnerability in Peleliu is primarily driven by Socioeconomic Status and Housing Characteristics. The bar charts indicate the socioeconomic themes contributing to the overall Vulnerability score.

**Housing Characteristics**
- 40.3% Households Using Biomass for Fuel
- 2.6% Households without Electricity
- 2.6% Households without Access to Public Water

**Communication Assets**
- 6.5% Households without Cell Phone
- 73.4% Households without Computer
- 63.0% Households without Internet
- 17.5% Households without Phone
- 28.6% Households without TV

**Household Composition and Disability**
- 5.3% Percent Disabled
- 22.3% Percent Under 18 Years of Age
- 27.3% Households with Single Mother
- 66.6% Percent Over 65 Years of Age

**Socioeconomic Status**
- $7,219.17 Average Income (USD)
- 38.2% Percent No High School Diploma
- 2.4% Unemployment Rate
- 28.8% Population Earning Less than $5.50 per day

**Housing Type and Transportation**
- 3.0 Median Number of Persons per Housing Unit
- 18.8% Percent of Households with No Vehicle
- 1.1% Population Living in Group Quarters
- 1.1% Institutionalized Population
- 9.6% Households Living in Temporary Structures
- 0.0% Housing Structures with 10 or more Units
COPING CAPACITY (CC)  RANK: 8 / 16 STATES ASSESSED  
SCORE: 0.534

Coping Capacity measures the systems, means, and abilities of people and societies to absorb and respond to disruptions in normal function. The bar charts below indicate the socioeconomic themes contributing to the overall Coping Capacity score.

Emergency Services Capacity

<table>
<thead>
<tr>
<th>Measure</th>
<th>Score</th>
<th>Rank</th>
</tr>
</thead>
<tbody>
<tr>
<td>Average Distance to Fire Station (mi)</td>
<td>25.76</td>
<td>1</td>
</tr>
<tr>
<td>Average Distance to Shelter (mi)</td>
<td>0.76</td>
<td></td>
</tr>
<tr>
<td>Average Distance to Health Facility (mi)</td>
<td>1.28</td>
<td></td>
</tr>
</tbody>
</table>

SCORE: 0.334  RANK: 11/16 STATES ASSESSED

Transportation Capacity

<table>
<thead>
<tr>
<th>Measure</th>
<th>Score</th>
<th>Rank</th>
</tr>
</thead>
<tbody>
<tr>
<td>Road Density (mi per square mi)</td>
<td>2.74</td>
<td></td>
</tr>
<tr>
<td>Maximum Distance to Koror (mi)</td>
<td>12</td>
<td></td>
</tr>
<tr>
<td>Average Distance to Port (mi)</td>
<td>0.79</td>
<td></td>
</tr>
</tbody>
</table>

SCORE: 0.800  RANK: 4/16 STATES ASSESSED
Below are the four thematic areas with the weakest relative scores:

- Socioeconomic Status
- Housing Characteristics
- Emergency Services Capacity
- Household Composition and Disability
KEY FACTORS INFLUENCING RESILIENCE

Socioeconomic Status
Populations experiencing socioeconomic constraints lack the necessary financial resources to adequately prepare for or recover from a natural disaster. The unemployed, low-income households, and those receiving public assistance have little to no financial buffers that would facilitate preparedness actions such as stocking extra food and supplies, support recovery actions such as repairing homes after a disaster, or fund mitigation actions that would protect their homes and property from future hazard impacts.

Housing Characteristics
Households experiencing access constraints with regard to information, clean water and energy are challenged to maintain a standard of living that meets basic household needs. Facing significant demands on daily routines effectively limit response and recovery capacity and the ability to maintain livelihoods. Limited communications assets, such as no telephone service or access to the internet can impede the ability of households to receive and act upon urgent hazard warning information.

Emergency Services Capacity
Societies establish capacities to manage emergencies that scale from day-to-day events up to catastrophes that impact all of society. Establishing and maintaining a broad range of systems and resources to support emergency services will increase the capacity for disaster management and response.

Household Composition and Disability
Single-parent households and those with dependent populations, such as the very young, elderly and the disabled may have more difficulty with mobilizing and evacuating in a timely fashion. The deaf or hard of hearing, for example, may not receive audible hazard alerts. Once evacuated, disabled populations and those with special needs will require additional services and care considerations in the response aftermath and during recovery. Ensure that plans and strategies include special accommodations for these populations.
HAZARD-SPECIFIC RISK (HSR)

- **Sea Level Rise**: RANK: 6 / 16 STATES ASSESSED, SCORE: 0.287
- **Sea Level Rise + Storm Surge**: RANK: 2 / 16 STATES ASSESSED, SCORE: 0.402
- **Storm Surge**: RANK: 2 / 16 STATES ASSESSED, SCORE: 0.408
- **Tropical Cyclone Wind**: RANK: 3 / 16 STATES ASSESSED, SCORE: 0.225
- **Earthquake**: RANK: 6 / 16 STATES ASSESSED, SCORE: 0.000
- **Tsunami**: RANK: 2 / 16 STATES ASSESSED, SCORE: 0.408
- **Landslide**: RANK: 7 / 16 STATES ASSESSED, SCORE: 0.190
MULTI-HAZARD RISK (MHR)

Peleliu's score and ranking are due to High Multi-hazard Exposure combined with Moderate Vulnerability and Moderate Coping Capacity scores.

Multi-hazard risk component scores compared to overall average country scores:

- Multi-Hazard Exposure
  - States Score: 0.711
  - Country Score: 0.498

- Vulnerability
  - States Score: 0.600
  - Country Score: 0.500

- Coping Capacity
  - States Score: 0.534
  - Country Score: 0.513
PALAU

SONSOROL

NDPBA SUBNATIONAL PROFILE
RISK AND VULNERABILITY COMPONENT SCORE

**MULTI-HAZARD RISK (MHR)** - Very High  
Score: 0.618  •  Rank: 3/16

**RESILIENCE (R)** - Very Low  
Score: 0.101  •  Rank: 16/16

**MULTI-HAZARD EXPOSURE (MHE)** - Very Low  
Score: 0.055  •  Rank: 15/16

**VULNERABILITY (V)** - Very High  
Score: 0.866  •  Rank: 3/16

**COPING CAPACITY (CC)** - Very Low  
Score: 0.067  •  Rank: 15/16

Population (2020 Census)  
53

Poverty  
24.1%

No High School Diploma  
25.0%

Households without Internet  
0.0%

Temporary Structures as Housing  
0.00%
MULTI-HAZARD EXPOSURE (MHE)

RANK: 15 / 16 STATES
SCORE: 0.055

ESTIMATED EXPOSURE TO EACH HAZARD:

- **Sea Level Rise**
  - Critical Infrastructure Exposed: 0.0%

- **Tsunami**
  - Critical Infrastructure Exposed: 0.0%

- **Storm Surge + Sea Level Rise**
  - Critical Infrastructure Exposed: 50.0%

- **Storm Surge**
  - Critical Infrastructure Exposed: 0.0%

- **Earthquake**
  - Critical Infrastructure Exposed: 0.0%

- **Landslide**
  - Critical Infrastructure Exposed: 0.0%

- **Tropical Cyclone Wind**
  - 100%
  - 53
  - $3.89 Million
  - Critical Infrastructure Exposed: 100%
VULNERABILITY (V)  
RANK: 3 / 16 STATES ASSESSED  
SCORE: 0.866

Vulnerability measures the conditions and processes that increase susceptibility of communities and systems to the damaging effects of hazards. Vulnerability in Sonsorol is primarily driven by Housing Characteristics and Household Composition and Disability. The bar charts indicate the socioeconomic themes contributing to the overall Vulnerability score.

Housing Characteristics  
RANK: 1/16 STATES ASSESSED  
SCORE: 1.000

- 94.1% Households Using Biomass for Fuel  
- 94.1% Households without Electricity  
- 64.7% Households without Access to Public Water

Communication Assets  
RANK: 13/16 STATES ASSESSED  
SCORE: 0.200

- 41.2% Households without Cell Phone  
- 88.2% Households without Computer  
- 0.0% Households without Internet  
- 0.0% Households without Phone  
- 0.0% Households without TV

Household Composition and Disability  
RANK: 3/16 STATES ASSESSED  
SCORE: 0.866

- 3.8% Percent Disabled  
- 47.2% Percent Under 18 Years of Age  
- 28.6% Households with Single Mother  
- 6.6% Percent Over 65 Years of Age

Socioeconomic Status  
RANK: 7/16 STATES ASSESSED  
SCORE: 0.600

- $8,261.88 Average Income (USD)  
- 25.0% Percent No High School Diploma  
- 3.5% Unemployment Rate  
- 24.1% Population Earning Less than $5.50 per day

Housing Type and Transportation  
RANK: 13/16 STATES ASSESSED  
SCORE: 0.000

- 3.5 Median Number of Persons per Housing Unit  
- 100.0% Percent of Households with No Vehicle  
- 0.0% Population Living in Group Quarters  
- 0.0% Institutionalized Population  
- 0.0% Households Living in Temporary Structures  
- 0.0% Housing Structures with 10 or more Units
COPING CAPACITY (CC)  

Coping Capacity measures the systems, means, and abilities of people and societies to absorb and respond to disruptions in normal function. The bar charts below indicate the socioeconomic themes contributing to the overall Coping Capacity score.

**Emergency Services Capacity**

- 205.05 Average Distance to Fire Station (mi)
- 169.63 Average Distance to Shelter (mi)
- 169.63 Average Distance to Health Facility (mi)

**Transportation Capacity**

- 0.00 Road Density (mi per square mi)
- 217 Maximum Distance to Koror (mi)
- 169.63 Average Distance to Port (mi)
Components of resilience are independent of natural hazard exposure. This type of measure helps rank states based on their likelihood of experiencing a disruption outside of a naturally occurring event.

Below are the four thematic areas with the weakest relative scores:

- Housing Characteristics
- Household Composition and Disability
- Emergency Services Capacity
- Transportation Capacity
KEY FACTORS INFLUENCING RESILIENCE

Housing Characteristics
Households experiencing access constraints with regard to information, clean water and energy are challenged to maintain a standard of living that meets basic household needs. Facing significant demands on daily routines effectively limit response and recovery capacity and the ability to maintain livelihoods. Limited communications assets, such as no telephone service or access to the internet can impede the ability of households to receive and act upon urgent hazard warning information.

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Emergency Services Capacity
Societies establish capacities to manage emergencies that scale from day-to-day events up to catastrophes that impact all of society. Establishing and maintaining a broad range of systems and resources to support emergency services will increase the capacity for disaster management and response.

Transportation Capacity
Denser and more diverse transportation networks provide more options for bringing outside resources into an impacted area and increase the ability of response stakeholders to access affected populations. Improved transportation capacity supports the ability to distribute resources before, during, and after a disaster.
<table>
<thead>
<tr>
<th>Hazard</th>
<th>Rank: States Assessed</th>
<th>Score</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sea Level Rise</td>
<td>15 / 16</td>
<td>0.000</td>
</tr>
<tr>
<td>Sea Level Rise + Storm Surge</td>
<td>7 / 16</td>
<td>0.270</td>
</tr>
<tr>
<td>Storm Surge</td>
<td>14 / 16</td>
<td>0.000</td>
</tr>
<tr>
<td>Tropical Cyclone Wind</td>
<td>10 / 16</td>
<td>0.079</td>
</tr>
<tr>
<td>Earthquake</td>
<td>6 / 16</td>
<td>0.000</td>
</tr>
<tr>
<td>Tsunami</td>
<td>14 / 16</td>
<td>0.000</td>
</tr>
<tr>
<td>Landslide</td>
<td>13 / 16</td>
<td>0.000</td>
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</table>
Sonsorol’s score and ranking are due to Very Low Multi-hazard Exposure combined with Very High Vulnerability and Very Low Coping Capacity scores.