1 INTRODUCTION

1.1 Overview

A brief description about your project

1.2 Purpose

The use of this project. What can be achieved using this.

2 Problem Definition & Design Thinking

2.1 Empathy Map

Paste the empathy map screenshot

2.2 Ideation & Brainstorming Map

Paste the Ideation & brainstorming map screenshot

3 RESULT

Final findings (Output) of the project along with screenshots.

4 ADVANTAGES & DISADVANTAGES

List of advantages and disadvantages of the proposed solution

5 APPLICATIONS

The areas where this solution can be applied

6 CONCLUSION

Conclusion summarizing the entire work and findings.

7 FUTURE SCOPE

Enhancements that can be made in the future.

8 APPENDIX

A.Source Code

Attach the code for he solution built.

INTRODUCTION

Overview

Population growth is determined by the net recruitment rate of individuals to the population. Population growth in a given generation is a linear combination of its initial size, birth, death, immigration, and emigration rates.

From 1960 to 2021 the population of India increased from 450.55 million to 1.41 billion people. This is a growth of 212.4 percent in 61 years. The highest increase in India was recorded in 1974 with 2.36 percent. The smallest increase in 2021 with 0.80 percent.

A population is defined as a group of individuals of the same species living and interbreeding within a given area. Members of a population often rely on the same resources, are subject to similar environmental constraints, and depend on the availability of other members to persist over time.

Effects of population growth

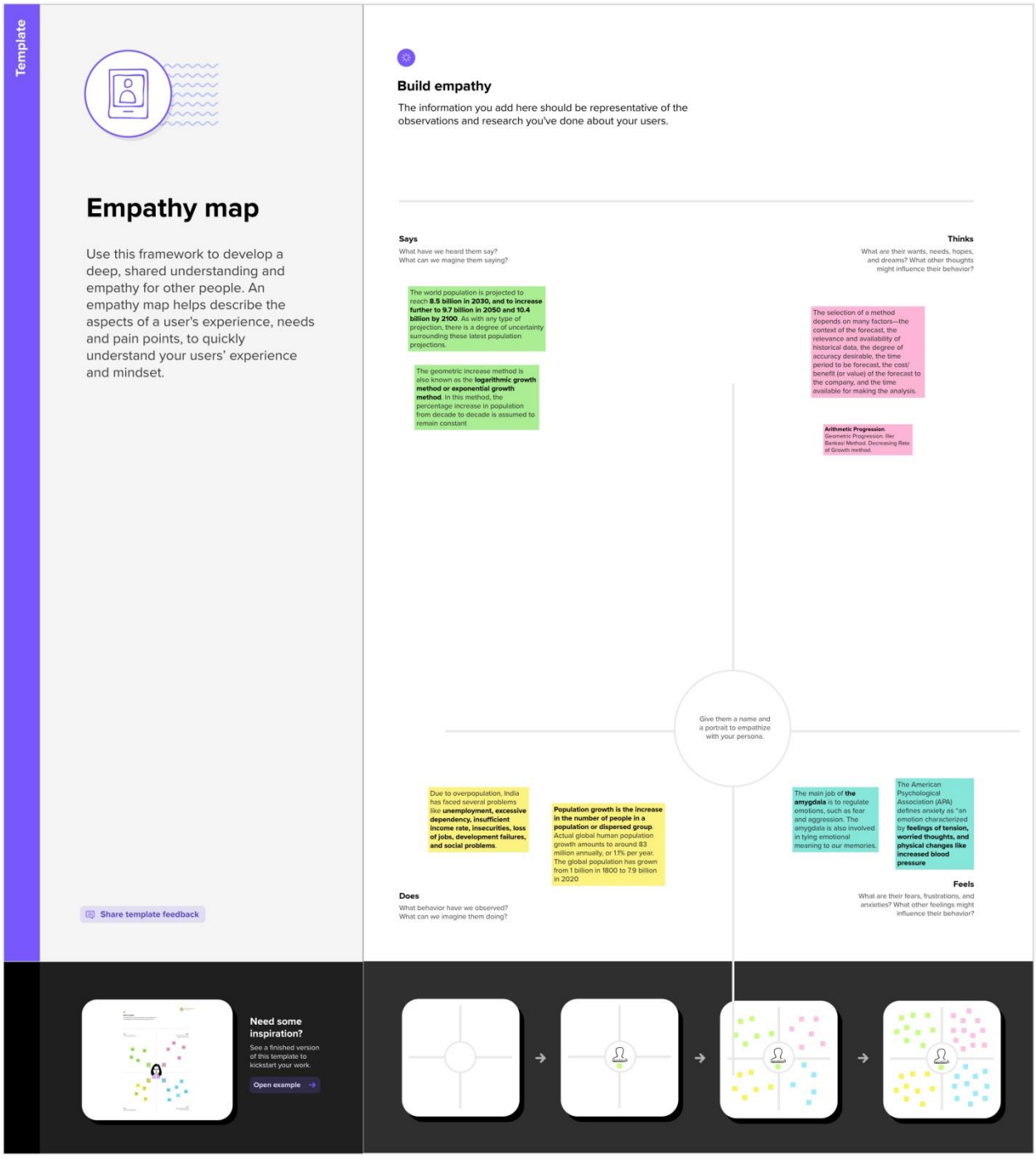
Population growth retards capital formation. As population increases, per capita available income declines. People are required to feed more children with the same income. It means more expenditure on consumption and a further fall in the already low savings and consequently in the level of investment.

1.2Purpose

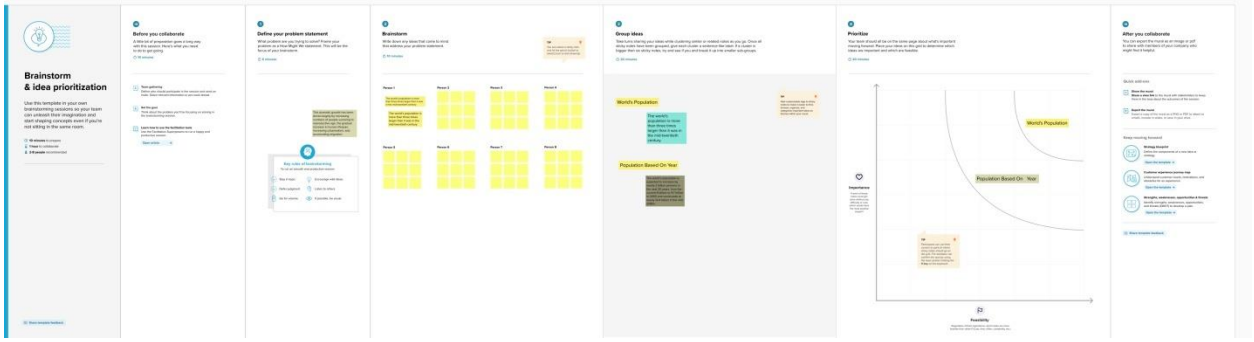
A youthful population presents an opportunity for accelerated economic growth on a per capita basis, if countries where the population is growing rapidly achieve a substantial and sustained decline in the fertility level, leading to an increased concentration of the population in the working-age range.

2 PROBLEM DEFINITION &DESIGN THINKING

2.1 Empathy Map

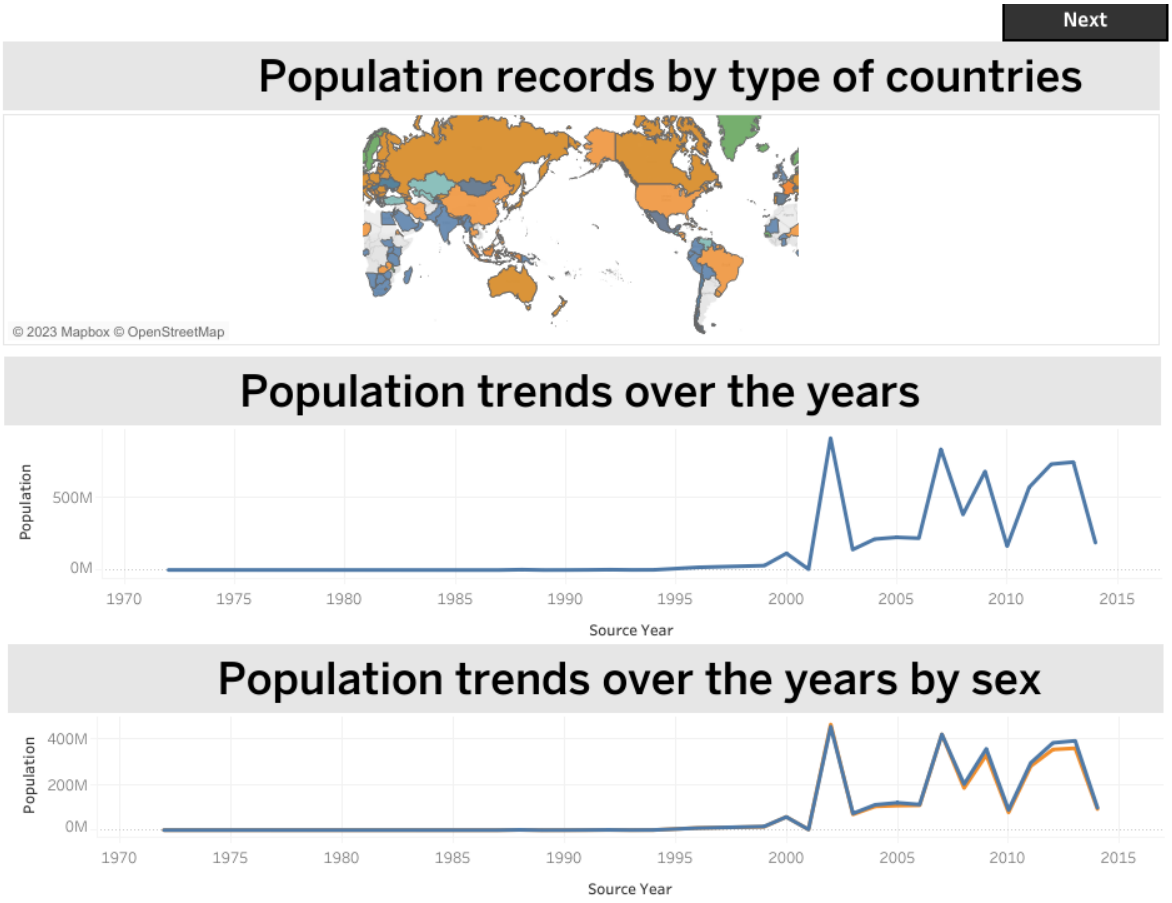


2.2 Ideation & Brainstroming Map

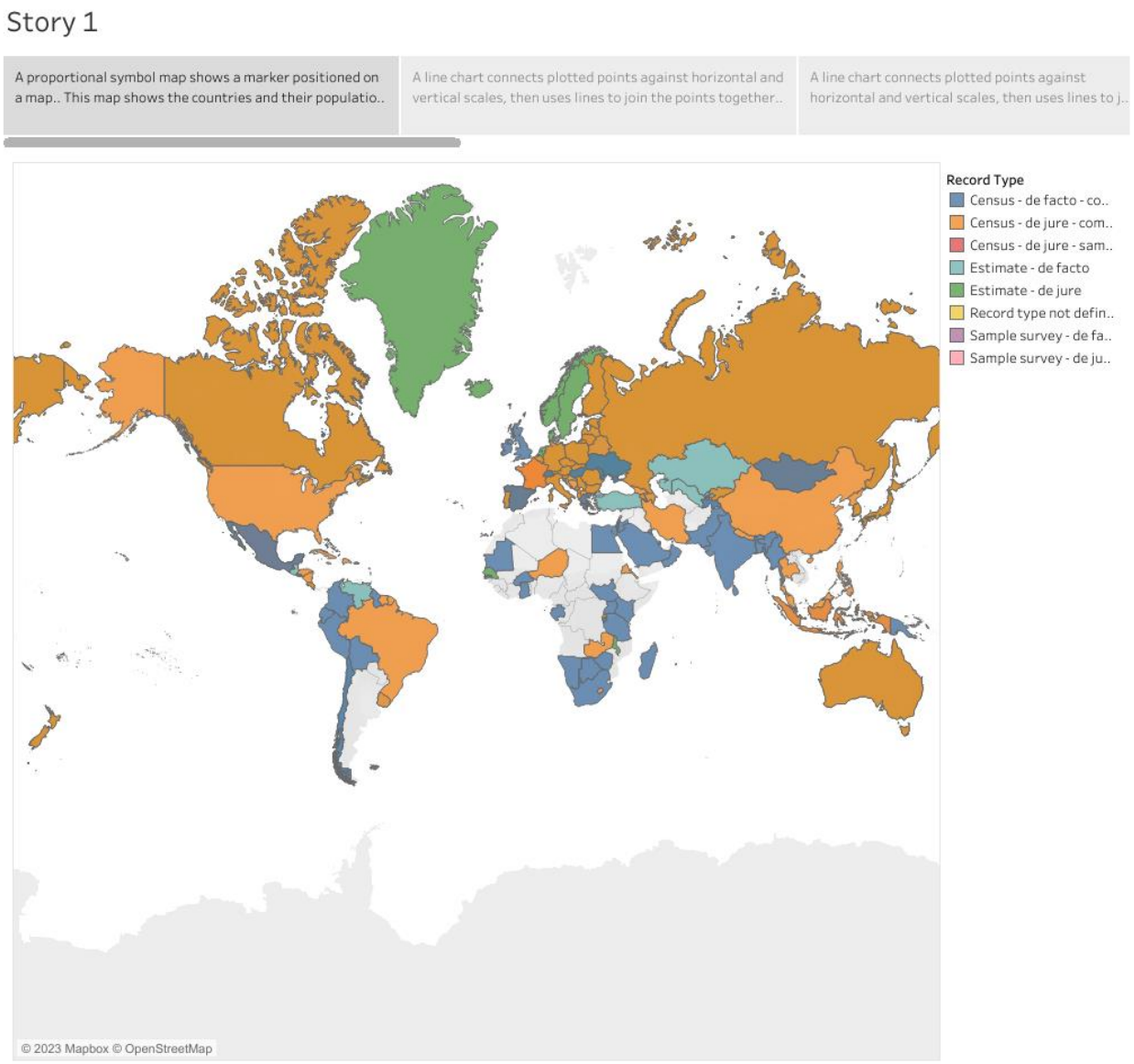


3 RESULT

Dashboard


Next
Population records by type of countries
© 2023 Mapbox © OpenStreetMap
Population trends over the years
Population
500M
0M
1970
1975
1980
1985
1990
1995
2000
2005
2010
2015
Source Year
Population trends over the years by sex
Population
400M
200M
0M
1970
1975
1980
1985
1990
1995
2000
2005
2010
2015
Source Year

Story



4 ADVANTAGES & DISADVANTAGES

ADVANTAGES

More people leads to greater human capital**.** If there are more people, the probability of finding a genius like Einsterin, Marie Curie, Beethoven increase. These exceptional people can lead to technological and cultural masterpieces which enrich our lives.

The past 200 years have shown exponential growth in technical development and innovation. There are many factors behind this, but the world’s

growing population means we have a bigger pool of human capital and the possibility of these cutting edge discoveries increase.

DISADVANTAGES

- Trying to reduce carbon and methane emissions to reduce global warming is relatively more difficult as the population.
- There will be greater threat on natural habitats as a greater population has greater demand for housing and farmland. This will increase pressure to cut down forests to make way for farming and housing.
- Higher population will lead to a greater consumption of non-renewable resources, leading to a faster depletion of natural resources.
- Higher population will lead to greater pollution levels in air, water and land. Higher pollution is associated with a range of health issues, such as cancer and asthma. The pollution also harms animals and plants.
- Soil degradation. To feed a growing planet, we have seen serious degrading of farmland (according to UN estimates) about 12 million hectares of farmland every year. This is due to factors, such as overgrazing, use of chemicals, climate change and use of chemicals.

5 APPLICATIONS

There are some applications associated with population growth, including, human evolution studies, the population growth is helped to study and observe the advancements in both anatomy and physiology. A growing population can be a result of many advantageous or beneficial traits or characteristics.

Population growth will lead to economic growth with more people able to produce more goods. It will lead to higher tax revenues which can be spent on public goods, such as health care and environmental projects

Population growth will lead to economic expansion since more people can produce more goods. More money will be available in tax revenue to fund public services like environmental and health care programs.

6 CONCLUSION

The Earth's current population is almost 7.6 billion people, and it is expanding. It is expected to surpass 8 billion people by 2025, 9 billion by 2040, and 11 billion by 2100. The population is quickly increasing, far surpassing our planet's ability to maintain it, given existing habits.

7 FUTURE SCOPE

A quantitative study of human distribution in a particular area or space. Variation in population density due to environmental or geographical condition. The demographic phenomenon like mortality, growth rate, birth rate, etc.

The world's population is expected to increase by nearly 2 billion persons in the next 30 years, from the current 8 billion to 9.7 billion in 2050 and could peak at nearly 10.4 billion in the mid-2080s.

The United Nations estimates that future world population growth may vary from 6 billion (a decrease) to 16 billion people by the year 2100

Population studies is broadly defined as the scientific study of human populations. Major areas studied include broad population dynamics; fertility and family dynamics; health, aging, and mortality; and human capital and labor markets. Researchers in population studies also focus on methodology.

8 APPENDIX

A Source code

```
<!DOCTYPE html>

<html lang="en">


<head>

  <meta charset="utf-8">

  <meta content="width=device-width, initial-scale=1.0" name="viewport">
```

```
  <title>A Population Forecasting Analysis Bootstrap Template - Index</title>
  <meta content="" name="description">
  <meta content="" name="keywords">

  <!-- Favicons -->
  <link href="assets/img/favicon.png" rel="icon">
  <link href="assets/img/apple-touch-icon.png" rel="apple-touch-icon">

  <!-- Google Fonts -->
  <link
href="https://fonts.googleapis.com/css?family=Open+Sans:300,300i,400,400i,600,
600i,700,700i|Playfair+Display:ital,wght@0,400;0,500;0,600;0,700;1,400;1,500;1,
600;1,700|Poppins:300,300i,400,400i,500,500i,600,600i,700,700i"
rel="stylesheet">

  <!-- Vendor CSS Files -->
  <link href="assets/vendor/animate.css/animate.min.css" rel="stylesheet">
  <link href="assets/vendor/aos/aos.css" rel="stylesheet">
  <link href="assets/vendor/bootstrap/css/bootstrap.min.css" rel="stylesheet">
  <link href="assets/vendor/bootstrap-icons/bootstrap-icons.css" rel="stylesheet">
  <link href="assets/vendor/boxicons/css/boxicons.min.css" rel="stylesheet">
  <link href="assets/vendor/glightbox/css/glightbox.min.css" rel="stylesheet">
  <link href="assets/vendor/swiper/swiper-bundle.min.css" rel="stylesheet">
```

```
  <!-- Template Main CSS File -->
  <link href="assets/css/style.css" rel="stylesheet">

  <!-- =======================================================
  * Template Name: A Population Forecasting Analysis
  * Updated: Mar 10 2023 with Bootstrap v5.2.3
  * Template URL: https://bootstrapmade.com/restaurantly-restaurant-template/
  * Author: BootstrapMade.com
  * License: https://bootstrapmade.com/license/
  ======================================================== -->
</head>

<body>

  <!-- ======= Top Bar ======= -->
  <div id="topbar" class="d-flex align-items-center fixed-top">
    <div class="container d-flex justify-content-center justify-content-md-between">

      <div class="contact-info d-flex align-items-center">
        <i class="bi bi-phone d-flex align-items-center"><span>+1 5589 55488 55</span></i>
```

```
      <i class="bi bi-clock d-flex align-items-center ms-4"><span> Mon-Sat: 11AM - 23PM</span></i>
    </div>

    <div class="languages d-none d-md-flex align-items-center">
      <ul>
        <li>En</li>
        <li><a href="#">De</a></li>
      </ul>
    </div>
  </div>
</div>

<!-- ======= Header ======= -->
<header id="header" class="fixed-top d-flex align-items-cente">
  <div class="container-fluid container-xl d-flex align-items-center justify-content-lg-between">

    <h1 class="logo me-auto me-lg-0"><a href="index.html">A Population Forecasting Analysis</a></h1>
    <!-- Uncomment below if you prefer to use an image logo -->
    <!-- <a href="index.html" class="logo me-auto me-lg-0"><img src="assets/img/hero-bg" alt="" class="img-fluid"></a>-->
```

```
    <nav id="navbar" class="navbar order-last order-lg-0">
      <ul>
        <li><a class="nav-link scrollto active" href="#hero">Home</a></li>
        <li><a class="nav-link scrollto" href="#about">About</a></li>
        <li><a class="nav-link scrollto" href="#analysis dashboard">Analysis Dashboard</a></li>
        <li><a class="nav-link scrollto" href="#analysis story">Analysis Story</a></li>
  </header><!-- End Header -->

  <!-- ======= Hero Section ======= -->
  <section id="hero" class="d-flex align-items-center">
    <div class="container position-relative text-center text-lg-start" data-aos="zoom-in" data-aos-delay="100">
      <div class="row">
        <div class="col-lg-8">
          <h1><span>A Population Forecasting Analysis</span></h1>

        </div>
      </div>

      </div>

    </div>
```

```
    </div>
  </section><!-- End Hero -->

  <main id="main">

    <!-- ======= About Section ======= -->
    <section id="about" class="about">
      <div class="container" data-aos="fade-up">

<div class="row">
          <div class="col-lg-6 order-1 order-lg-2" data-aos="zoom-in" data-aos-delay="100">
            <div class="about-img">
              <img src="assets/img/about-bg.jpg" alt="">
            </div>
          </div>
          <div class="col-lg-6 pt-4 pt-lg-0 order-2 order-lg-1 content">
            <h3>Population Forecasting .</h3>
            <p class="fst-italic">
              Design of water supply and sanitation scheme is based on the projected population of a particular city, estimated for the design period. Any underestimated value will make system inadequate for the purpose intended; similarly overestimated value will make it costly. Changes in the population of the city over the years occur, and the system should be designed taking into account of the population at the end of the design period.
```

```
          </p>
           Factors affecting changes in population are:
          <ul>
            <li><i class="bi bi-check-circle"></i> increase due to annexation.</li>
            <li><i class="bi bi-check-circle"></i> increase due to births.</li>
            <li><i class="bi bi-check-circle"></i> decrease due to deaths velit.</li>
            <li><i class="bi bi-check-circle"></i> increase/decrease due to
migrationr.</li>
          </ul>

        </div>
       </div>

     </div>
   </section><!-- End About Section -->


   </section><!-- End Gallery Section -->

   <!-- ======= Chefs Section ======= -->
   <section id="chefs" class="chefs">
     <div class="container" data-aos="fade-up">
```

Analysis Dashboard

<noscript></noscript><object class='tableauViz' style='display:none;'><param name='host_url' value='https%3A%2F%2Fpublic.tableau.com%2F' /> <param name='embed_code_version' value='3' /> <param name='site_root' value='' /><param name='name' value='Dashboard_16801880869910/Dashboard1' /><param name='tabs' value='no' /><param name='toolbar' value='yes' /><param name='static_image' value='https://public.tableau.com/static/images/Da/Dashboard_16801880869910/Dashboard1/1.png' /> <param name='animate_transition' value='yes' /><param name='display_static_image' value='yes' /><param name='display_spinner' value='yes' /><param name='display_overlay' value='yes' /><param name='display_count' value='yes' /><param name='language' value='en-US' /></object> <script type='text/javascript'> var divElement = document.getElementById('viz1680962772965'); var vizElement = divElement.getElementsByTagName('object')[0]; if (divElement.offsetWidth > 800) { vizElement.style.width='1000px';vizElement.style.height='827px';} else if (divElement.offsetWidth > 500) { vizElement.style.width='1000px';vizElement.style.height='827px';} else { vizElement.style.width='100%';vizElement.style.height='827px';} var scriptElement = document.createElement('script'); scriptElement.src = 'https://public.tableau.com/javascripts/api/viz_v1.js'; vizElement.parentNode.insertBefore(scriptElement, vizElement); </script>

Analysis Story

<noscript></noscript><object class='tableauViz' style='display:none;'><param name='host_url' value='https%3A%2F%2Fpublic.tableau.com%2F' /> <param name='embed_code_version' value='3' /> <param name='site_root' value='' /><param name='name' value='Story_16801878234720/Story1' /><param name='tabs' value='no' /><param name='toolbar' value='yes' /><param name='static_image' value='https://public.tableau.com/static/images/St/Story_16801878234720/Story1/1.png' /> <param name='animate_transition' value='yes' /><param name='display_static_image' value='yes' /><param name='display_spinner' value='yes' /><param name='display_overlay' value='yes' /><param name='display_count' value='yes' /><param name='language' value='en-US' /></object>   <script type='text/javascript'>   var divElement = document.getElementById('viz1680962910955');   var vizElement = divElement.getElementsByTagName('object')[0];   vizElement.style.width='1016px';vizElement.style.height='991px';   var scriptElement = document.createElement('script');   scriptElement.src = 'https://public.tableau.com/javascripts/api/viz_v1.js';   vizElement.parentNode.insertBefore(scriptElement, vizElement);   </script>

</main><!-- End #main -->

```
  <div id="preloader"></div>

  <a href="#" class="back-to-top d-flex align-items-center justify-content-center"><i class="bi bi-arrow-up-short"></i></a>


  <!-- Vendor JS Files -->

  <script src="assets/vendor/aos/aos.js"></script>

  <script src="assets/vendor/bootstrap/js/bootstrap.bundle.min.js"></script>

  <script src="assets/vendor/glightbox/js/glightbox.min.js"></script>

  <script src="assets/vendor/isotope-layout/isotope.pkgd.min.js"></script>

  <script src="assets/vendor/swiper/swiper-bundle.min.js"></script>

  <script src="assets/vendor/php-email-form/validate.js"></script>


  <!-- Template Main JS File -->

  <script src="assets/js/main.js"></script>


</body>


</html>
```