“Enabling Manufacturing Ecosystem” of Karnataka

High Level Delegation visit
Seoul, South Korea

Xx xxxxxx 2018
Karnataka’s Strong Economy

Focus Sectors

Karnataka’s Robust Ecosystem

Event
Karnataka’s Strong Economy
**4\textsuperscript{th} largest economy in the country**  
**Consistent growth over the last decade**

### Economic Overview

<table>
<thead>
<tr>
<th>INR 8.72 lakh crore</th>
<th>GSDP\textsuperscript{1}</th>
</tr>
</thead>
<tbody>
<tr>
<td>2\textsuperscript{nd} highest Per Capita Income among bigger states\textsuperscript{1}</td>
<td></td>
</tr>
<tr>
<td>2\textsuperscript{nd} in terms of attracting FDIs\textsuperscript{2}</td>
<td></td>
</tr>
<tr>
<td>INR 3.25 lakh crore</td>
<td>total exports\textsuperscript{1}</td>
</tr>
</tbody>
</table>

### Advantage KARNATAKA

| 1\textsuperscript{st} in attracting investment intentions in 2017\textsuperscript{3} |
| 1\textsuperscript{st} in IT & ITes Exports\textsuperscript{4} |
| 4\textsuperscript{th} largest skilled workforce\textsuperscript{4} |
| More than 400 research and development firms\textsuperscript{4} |
| Pioneer in introducing niche policies |
| Home to several premier institutions |
| Among top 15 startup ecosystems of the world\textsuperscript{5} |
| 400 out of Fortune 500 companies have outsourced operations in the state\textsuperscript{5} |

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1. Economic Survey of India 2016-17, at constant 2011-12 prices  
2. Karnataka Economic Survey 2016-17  
3. DIPP’s SIA Index up to September 2017  
4. Invest Karnataka  
32% share in India’s manufacturing sector investment
Thriving Industrial Scenario

Karnataka’s manufacturing sector contribution to GSDP in FY 17 was 14.76% while the national average is 14%\(^1\)

| GSDP contribution at Current Prices (2016-17)\(^1\) |
|------------------|------------------|
| Manufacturing    | 14.76%           |
| Industry         | 23.68%           |

Index of Industrial Production Growth Rates (Manufacturing) 2015-2016 (Base Year 2004-05)\(^1\)

<table>
<thead>
<tr>
<th>State</th>
<th>Growth Rate</th>
</tr>
</thead>
<tbody>
<tr>
<td>Karnataka</td>
<td>2.34</td>
</tr>
<tr>
<td>National</td>
<td>2.0</td>
</tr>
</tbody>
</table>

Ambitious National Manufacturing Policy

Achieving 25% of GDP share for the manufacturing sector in the next decade

Tops the Country in Manufacturing Excellence

32% of the manufacturing sector's share in investments being attracted by Karnataka\(^2\)

Karnataka MSME (Upto Oct, 2017)\(^3\)

<table>
<thead>
<tr>
<th>Description</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Investment of</td>
<td>INR 5,860 crores</td>
</tr>
<tr>
<td>2,27,681 persons</td>
<td>employed</td>
</tr>
<tr>
<td>25,234 Registered</td>
<td>units</td>
</tr>
</tbody>
</table>

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1. Karnataka Economic Survey 2016-17
2. ASSOCHAM Study September 2017
3. Directorate of Industries and Commerce
BENGALURU
Chennai 347 kms away
Mumbai 980 kms away

[Map showing connectivity between BENGALURU, Chennai, and Mumbai]

**Only State to have 2 industrial corridors**
- CBIC (Chennai-Bengaluru Industrial Corridor)
- BMEC (Bengaluru- Mumbai Economic Corridor)

**CONNECTIVITY**
- First phase of bidding under UDAN- Mysuru, Bidar, BIAL and Vidyanagar (Ballari)
- BIAL is the first airport in the country to have a helicopter-taxi (heli-taxi) service
- 2.4 lakh kms of continuing road length
- Presence of 13 major National Highways
- 9th major port in India- New Mangalore Port with deep inner harbour linkages in the western coast
Bengaluru has topped the list of 22 tech cities across the world in Affordable Living (Savills Tech Cities Index).

Bengaluru only city in India ranked 19th among world’s 25 Hi-Tech cities ahead of Berlin, Hong Kong and Shenzhen (Research firm 2thinknow).

Bengaluru is the 4th largest Technology Cluster in the world (United Nations).

State is the Knowledge, Research and Innovation Hub of Asia.

Bengaluru ranks as No.1 Digital City in the World as of November 2017 (The Economist Group).

State houses 80 Fortune 500 companies and over 700 MNCs.

Bengaluru has topped the list of 22 tech cities across the world in Affordable Living (Savills Tech Cities Index).
Focus Sectors
Ecosystem Integrators
Aerospace and Defence Equipment

1st

- **Highest R&D Centres**, such as, Indian Space Research Organization (ISRO) and the Defence Research and Development Organization (DRDO)
- **First Aerospace Policy** in the country
- BIA is the first airport in India under PPP model
- Frist Centre for Excellence in Aerospace

India's first Aerospace SEZ operational at Belgaum

- 65% of country’s aerospace investments
- Home to quarter of India’s aircraft and spacecraft
- 70% of supplier base
- 67% of country’s aircraft and helicopters for Defence Services
- Aerospace Technology Center and Aerospace Common Finishing Facility being set up

Presence of more than 2,000 small and medium enterprises focused on component manufacturing, tooling & testing equipment and assembling
Ecosystem Integrators
Auto, Auto components & Electrical Vehicles

► Output doubled in the last five years
► 4th largest automobile producing state in the country
► 8.5% to the national output
► 14 million registered vehicles and connectivity to 4 of the top five automobile markets in the country
► Employment to more than 55,000 workers
► 7 major OEMs and more than 50 auto component manufacturers

AUTOMOBILE AND AUTO COMPONENTS

Manufacturing hub for auto majors like Volvo, Toyota Kirloskar, TVS Suzuki, Telco and auto component companies like BOSCH, Delphi, Denso, Siemens, Escorts
► World-class Auto and Auto Component Clusters
► Karnataka Automobile Research & Innovation Centre to be setup

Electrical Vehicle and Energy Storage Policy 2017-Vision to make Karnataka the ‘EV capital of India’
Ecosystem Integrators
Biotech, Pharma and Medical Devices

**BIOTECHNOLOGY**

- Home to over 60% of country’s Biotech companies
- State accounts for 54% of India’s Biotech Workforce
- 1/3rd of BT exports of the country
- Bio Innovation Clusters; Biotech Finishing Schools; Proposed Marine Biotech Park, Animal Biotech Park, Agri Biotech Park
- Bio-venture Fund of INR 50 crore
- Bangalore Bio-innovation Centre largest Bio-incubation centre in the country

**Biotechnology Policy 2017-2022**

envisages $100 billion market

**PHARMA**

- 5th in pharmaceutical exports
- 12% of country's exports
- Around 10% of country’s pharmaceutical revenue
- 1st state to bring out Pharmaceutical Policy
- Presence of Exclusive Pharma Special Economic Zone, Pharma Industrial Areas and R&D Centres

**MEDICAL DEVICES**

Bengaluru and Mysuru hub for manufacturing of Medical Devices
Fisheries is a high-growth sector

► 24% CAGR production
► 30% CAGR exports

Ecosystem Integrators
Agri and Food Processing

1st

► To introduce online trading in agro-markets
► In floriculture, with 75% of India’s total flower production
► Leading Producer of Coffee, Gherkins, Silk, Green Chilli, Tamarind, Sunflower, Maize, Coarse Cereals, Sugarcane, and Pulses

► Sector growing at 20% CAGR, more than the national average
► Exports from the State have been growing at 22% CAGR

► 4 Food Parks and 2 Mega Food Parks
► Establishment of 14 exclusive Farmer Federations for Organic & Millet Products
► 20 agro and food processing clusters
► Utopia Cashew Cluster is coming up in Kumta

Over 65% of the state’s geographical area is under agriculture, and employs 60% of state’s population

KEY PLAYERS
Ecosystem Integrators
Textiles and Apparel

- 9 handloom clusters, Dedicated Apparel zones, 233.3 hectare Textile SEZ
- US$10.4 million ‘Silk City’ proposed to be developed near Bengaluru
- First Integrated Textile Park at Dodaballapura

Garment Capital of India contributing almost two-thirds to the State’s industry output
- 20% of the national garment production
- 15% of India’s export earnings
- 14% of India’s industrial production

- 65% silk, 11% wool and 6% cotton production of the country
- Leading market for technical textiles

- 144 Skill Development Centers and 168 private training centres and has trained 1,65,200 personnel
Ecosystem Integrators
Innovation & Manufacturing Start-up

Biggest Start-up destination, more than 1300+ start-ups account for more than 40% of overall funding as on 2016

First State in the country to introduce a Startup Policy in 2015

Dedicated Start-up Cell guided by the Start-up Policy

Existing and Upcoming Centres of Excellence for
► Aerospace
► Cyber-security
► Animation and Gaming
► Artificial Intelligence (AI) and Big Data

Startup Policy envisaged growth of 20,000 new start-ups, including 6,000 product start-ups by 2020.

ELEVATE 100, with a corpus of INR 400 crore aims to provide a comprehensive entrepreneurship platform for start-ups

BENGALURU
► Startup Capital of India
► Among the top 15 Startup ecosystems in the world

Karnataka’s Robust Ecosystem
Skilled Karnataka
Skilling Karnataka youth to meet industry needs

VISION
► Karnataka aspires to skill 1.88 crore youth during the period 2017-2030
► Annually to 13.4 lac existing workforce and new entrants

DEMOGRAPHIC DIVIDEND
2.12 crore in the age group of 16-35 years

SKILL INFRASTRUCTURE
► 1,777 public and private ITIs provide skill training to 106,000 youth
► Around 290 polytechnics, with seating capacity of 75,000
► Apprenticeship Training Scheme with over 4,200 establishments with over 39,000 seats
► Modular Employability Scheme, active 800 VTPs implementing 500 courses under 68 sectors

Source: Draft Skill Development Policy for Karnataka, 2017
Knowledge Capital of the Country
R&D institutes/ Scholarly institutes bolstering industrial development

More than 400 Multi-National Companies have global R&D Centres

Heart of Modern India and driving growth through its 150 Industrial Hubs

Exclusive Centre of Excellence (CoE) in Data Sciences and Artificial Intelligence (AI) in Bengaluru

Largest number of Software Technology Parks

Largest Biotechnology Hub

Largest number of R&D centers

Knowledge Hub

Largest number of Medical Education Institutions

Largest number of Industrial Training Institutes

Bengaluru – hotbed for IoT- 536 of the 971 IoT startups in India, are registered in Bengaluru

Karnataka ranked 2nd in the state-wise list of patent applications with 2,102 patent applications

World- class Incubation Centers and have established Labs and Common Instrumentation Facilities
Fostering Quality Education

Karnataka undertook significant reforms with increased public investment to ensure Access, Equity and Quality in Education.

Universalisation of secondary education to achieve the target of 85% enrolment in 14-18 age group in classes 9 to 12”

<table>
<thead>
<tr>
<th>LOWER PRIMARY SCHOOLS</th>
<th>GER</th>
<th>NER</th>
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<tbody>
<tr>
<td>103.71</td>
<td>96.40</td>
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</table>

<table>
<thead>
<tr>
<th>HIGHER PRIMARY SCHOOLS</th>
<th>GER</th>
<th>NER</th>
</tr>
</thead>
<tbody>
<tr>
<td>92.90</td>
<td>79.16</td>
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</table>

<table>
<thead>
<tr>
<th>Engineering Colleges</th>
<th>206</th>
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<tbody>
<tr>
<td>Universities</td>
<td>44</td>
</tr>
<tr>
<td>International Schools</td>
<td>16</td>
</tr>
<tr>
<td>Medical Colleges (MBBS)</td>
<td>55</td>
</tr>
</tbody>
</table>

Source: Karnataka Economic Survey 2016-17
Transparent Policy Initiatives
Extensive support to new industries and entrepreneurs

Attractive Incentives

- Exemption of Stamp Duty on Regn. of land
- Tech Upgradation & Adoption
- Concessional Registration Charges
- Reimbursement of Land conversion Fee
- Investment Subsidy
- Interest free Loan on VAT/SGST
- Investment Subsidy on ETP
- Electricity Duty Exemption
- Plug and play facilities at concessional rates

- Industrial Policy
- Aerospace Policy
- Textile Policy
- Agri Business Policy
- Biotech Policy
- Startup Policy
- Electric Vehicle & Energy Storage Policy
Ease Of Doing Business
Aimed at preparing Karnataka for the 21st century

INITIATIVES

► Single Window Portal and Clearance
► Relationship Managers for handholding investors
► Grievances Redressal Cell
► Online Monitoring of Disbursal of Incentives
► Common Application for Different Incentives
► Integrated System for Approvals
Vendor Development to promote localization
Enabling balanced regional development

1. **Vendor Development to facilitate**: 150+ Industrial Areas; 26 Operational SEZs
3. **Marketing and R&D Support**: Vendor Development Meet, Trade Fairs, MSME Councils, R&D centers
4. **Value Chain Cluster Development**: 100 clusters to be set up during industrial policy period

**Vendor Development Programmes**

1. **Collaboration/vendor opportunities for MSMEs**
2. **Capacity Building**: Handholding of MSMEs, exposure visits, Fairs, etc.
3. **Skill Development**: 13 Skill Development Training Centres
5. **Incentives**: Under Industrial Policy 2014-2019
6. **Market Linkages**: International Trade Fairs & Exhibitions
7. **MSME Councils**: in Bengaluru, Mysore, Belgaum & Gulbarga
Lifestyle and entertainment
Mix business with pleasure for retaining intellect

BENGALURU

► One of the most **developed and affordable cities** in the country
► **Handicrafts and shopping destination** with 24 silk emporiums, 6 Handicraft emporiums and 8 shopping malls in Bengaluru
► **Garden City of India**

Rich culture and heritage, including Yakshagna dance form and a high theatre presence

40+ five star hotels in the state, such as Taj Group of Hotels, Hyatt, etc.

Known for excellent healthcare facilities and holistic health options

20 shopping malls in the state offering a wide variety of world renowned brands

Varied regional cuisine with specialities such as Mysore Pak, Kori Gassi which are popular worldwide

10+ golf clubs, counties, resorts in the state, and a variety of sports and fitness clubs in towns and cities

Popular tourism destination including UNESCO Heritage Sites, attracting tourists from across the world