Status and Future Plan for National Logistics Master Plan

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Myanmar

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Contents

- General Information about Myanmar
- Domestics Transport Infrastructure
- International Corridors
- National Logistics Master Plan Implementation
- HRD for Logistics Service Providers
- Challenges and Issues to be addressed
- Conclusion
General Information about Myanmar

- **Formal name**: Republic of the Union of Myanmar
- Myanmar lies between
  - Lat. 9° 32’ and 28° 31’ N and
  - Long. 92° 10’ and 101° 11’ E
- **Total land area**: 676,578 sq km
- **Total length**
  - (South to North): 2,100 km
  - (East to West): 925 km
- **Total land boundaries**: 5,867 km
- **Total length of coastline**: 2,832 km
  - **Rakhine Coast**: 713 Km
  - **Delta Coast**: 437 Km
  - **Thanintharyi Coast**: 1078 Km
- **Cities**: Naypyitaw, Yangon, Mandalay
Domestics Transport Infrastructure
Myanmar proposed eight potential places for dry port to ESCAP in July 2011:

- Mandalay
- Tamu
- Muse
- Mawlamyine
- Bago
- Monywa
- Pyay
- Yangon
Airports Infrastructure

- Total 69 aerodromes
- 33 airports are operational

<table>
<thead>
<tr>
<th>International Airports</th>
<th>(3)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Yangon</td>
<td>Mandalay</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Domestic Airports</th>
<th>(30)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Putao</td>
<td>Heho</td>
</tr>
<tr>
<td>Myitkyina</td>
<td>Nyaung U</td>
</tr>
<tr>
<td>Bamaw</td>
<td>Lashio</td>
</tr>
<tr>
<td>Kalay</td>
<td>Magway</td>
</tr>
<tr>
<td>Khamti</td>
<td>Pakhokku</td>
</tr>
<tr>
<td>Hommalin</td>
<td>Kyauk Tu</td>
</tr>
<tr>
<td>Loikaw</td>
<td>Ann</td>
</tr>
<tr>
<td>Monywa</td>
<td>Sittwe</td>
</tr>
<tr>
<td>Kyaing Tong</td>
<td>Thandwe</td>
</tr>
<tr>
<td>Tachileik</td>
<td>Kyauk Phyu</td>
</tr>
<tr>
<td>Monghsat</td>
<td>Pathein</td>
</tr>
</tbody>
</table>
Sounds of the World

- Nine potential ports along the coast:
  - Sittwe, Kyaukphyu, Thandwe, Pathein, Yangon, Mawlamyine, Dawei, Myeik, Kawthoung

- Currently, Yangon is the main international port of Myanmar

**International wharves in Yangon Port**

- Yangon Inner Harbour Area - 24 wharves
- Thilawa Area - 10 wharves

**Total** - 34 wharves
1. Developed 10 Plots
2. Under Construction 5 Plots (GC Terminal)
3. Under Construction 10 1/3 Plots (Tanker Berth)
4. Under Construction 5 2/3 Plots (Grains Terminal)
5. MPA(ODA Loan) 5 Plots
6. Liquid Bulk Terminal 1 Plots
Inland River Ports

**Ayeyarwaddy River**
- Sinkham Port
- Mandalay Port
- Pakakku Port
- Magway Port

**Chindwin river**
- Monywa Port
- Kalewa Port

**Benefits** - By establishing standard Inland Ports along Ayeyarwaddy and Chindwin rivers:
- to promote efficient cargo handling
- to promote the containerization by using inland water ways
- to support the facilitation of inland water transport
- to create job opportunities and develop the living standards of the entire people

*Feasibility Study for Inland Water Transport Facilities Improvement Project in Mandalay has been completed in March 2014 with the assistance of JICA. Now, project ‘design and cost are being considered.*
Transport Linkage Plan between Future Development Zones and Arterial Highways
Myanmar Railways Network on 31st October 2016

- Single Route: 5405.285 km
- Double Route: 705.196 km
- Total Route Length: 6110.481 km
- Total Track Length: 7942.372 km
- Bridges: 12103 Nos
- Tunnels: 12 Nos
- Railway Stations: 960 Nos
- 1000 mm gauge (Narrow gauge)

The longest rail transport network in ASEAN
International Corridors
Asian Highway (32) countries - 141000 km
ASEAN Highway Route

- 23 Routes, Length 36,000 kms
- 7 Routes in Myanmar:
  AH1, AH2, AH3, AH14, AH111, AH112, AH123
1. North-South Corridor: Kunming-Bangkok
2. East-West Corridor: Mawlamyine-Danang
3. Southern Corridor: Dawei-Ouy Nhon/Vung Tau
4. Northern Corridor: Fangcheng-Tamu
5. Western Corridor: Tamu-Mawlamyine
6. Central Corridor: Kunming-Sihanoukville/Sattahip
7. Eastern Corridor: Kunming-Ho Chi Minh City
8. Southern Coastal Corridor: Bangkok-Nam Can
9. Eastern Corridor: Nanning-Bangkok/LaemChabang
Master Plans on Transport & Logistics

- National Transport Master Plan (MYT_Plan) (2015-2040)
- Master Plan for Arterial Roads Network Development (2015-2040)
- The Urban Transport Development Plan of the Greater Yangon (YUTRA) (2016-2040)
- National Logistics Master Plan (Under Processing)
National Logistics Master Plan Implementation
10 Major Corridors

A  Central North-South Corridor
B  East - West Corridor
C  Northern Corridor
D  Mandalay - Tamu Corridor
E  Second East - West Corridor
G  East - West Bridging Corridor
H  Delta Area Network
J  Southern Area Development Corridor
K  Western North-South Corridor
L  Eastern North - South Corridor
Projects for Sustainable Transport

- Road Sector (48) Projects
- Rail Sector (14) Projects
- Maritime Sector (15) Projects
- Inland Water Transport Sector (33) Projects
- Air Sector (32) Projects

Total (142) Projects
National Transport Corridors & National Logistics Corridors

Transport Corridor
MYT Plan, 2015

Logistics Corridor
Project for the National Logistics Master Plan

- **Objective of the Project:** is to formulate a strategic and workable logistics development master plan by adding and supplementing the existing national transport master plan namely MYT Plan 2014.

- **Time Frame of this Project:** The Project was started from June 2016 and scheduled to be completed by the end of December 2017.

- **Prioritization of the Projects:**
  - Regional and International Connectivity
  - Domestic Connectivity
  - Economic Benefits
  - Consistency with National Economic Policy

- **The total of 173 projects include in the Plan**
  - 108 projects from MYT Plan
  - 48 hard infrastructure projects
  - 17 soft infrastructure projects
“To create an efficient, competitive and environmentally friendly logistics system in accordance with regional and international perspectives including the enhancement of multimodal transportation for the economic development and the poverty reduction of Myanmar“
National Logistics Corridors

1) South East Logistics Corridor
   Highway, railway
2) North South Logistics Corridor
   Expressway, highway, railway, airway
3) Coastal Marine Corridor
   Coastal shipping, inland waterway, highway
4) Main River Logistics Corridor
   Inland waterway, highway, railway
5) Myanmar India Logistics Corridor
   Highway, railway, inland waterway
6) Trans Myanmar Logistics Corridor
   Highway, railway, inland waterway

Multimodal Hub Development

Source: Study Team
GDP will grow continuously to 2030 at 7% per annum.
A rapid development of manufacturing sector lead by FDI
Regional connectivity became stronger year by year
Enhancement of urban and rural synergy
### Demand Forecast of Logistics Corridor with Transport Mode

<table>
<thead>
<tr>
<th>Logistics Corridor</th>
<th>Major Link/terminal</th>
<th>Year</th>
<th>Total</th>
<th>Road</th>
<th>Railway</th>
<th>Port (Local)</th>
<th>IWT</th>
<th>Air</th>
</tr>
</thead>
<tbody>
<tr>
<td>Myanmar-India Corridor</td>
<td>Tamu-Mandalay</td>
<td>2015</td>
<td>3,800</td>
<td>500</td>
<td></td>
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<td></td>
<td></td>
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<td>4,400</td>
<td></td>
<td></td>
<td>8,000</td>
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<tr>
<td>North-South Corridor</td>
<td>Yangon-Bago</td>
<td>2015</td>
<td>19,900</td>
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<tr>
<td></td>
<td></td>
<td>2030</td>
<td>80,500</td>
<td>53,200</td>
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<tr>
<td></td>
<td>Bago-Mandalay</td>
<td>2015</td>
<td>12,900</td>
<td>8,400</td>
<td>4,500</td>
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<td>Main River Corridor</td>
<td>Yangon-Mandalay</td>
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<td>7,700</td>
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<td>19,600</td>
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<td>Trans Myanmar Corridor</td>
<td>Kyauphyu-Magway</td>
<td>2015</td>
<td>7,000</td>
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<tr>
<td></td>
<td>Magway-Mon Lah</td>
<td>2015</td>
<td>2,400</td>
<td>2,400</td>
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<td></td>
<td></td>
<td>2030</td>
<td>4,100</td>
<td>4,100</td>
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<tr>
<td>South-East Corridor</td>
<td>Bago-Mawlamaing</td>
<td>2015</td>
<td>13,800</td>
<td>10,300</td>
<td>3,500</td>
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<td>58,000</td>
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<td>Mawlamaing-Myawaddy</td>
<td>2015</td>
<td>8,500</td>
<td>8,500</td>
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<td></td>
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<td></td>
<td>Mawlamaing-Thanbyuzayat</td>
<td>2015</td>
<td>4,900</td>
<td>2,800</td>
<td>2,100</td>
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<td>21,100</td>
<td>16,000</td>
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<tr>
<td></td>
<td>Thanbyuzayat-Dawei</td>
<td>2015</td>
<td>4,000</td>
<td>2,900</td>
<td>1,100</td>
<td></td>
<td></td>
<td></td>
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<td></td>
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<td>2030</td>
<td>18,100</td>
<td>13,000</td>
<td>5,100</td>
<td></td>
<td></td>
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<tr>
<td>Coastal Marine Corridor</td>
<td>Sittwe-Yangon-Kawthaung</td>
<td>2015</td>
<td>4,200</td>
<td></td>
<td>4,200</td>
<td></td>
<td></td>
<td></td>
</tr>
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<td></td>
<td></td>
<td>2030</td>
<td>12,000</td>
<td></td>
<td>12,000</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Aviation</td>
<td>Total Air Cargo</td>
<td>2015</td>
<td>89,150</td>
<td>56,900</td>
<td>17,000</td>
<td>4,200</td>
<td>11,000</td>
<td>50</td>
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<td></td>
<td></td>
<td>2030</td>
<td>338,450</td>
<td>222,600</td>
<td>76,000</td>
<td>12,000</td>
<td>27,600</td>
<td>250</td>
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<tr>
<td>Total</td>
<td>Change in Times</td>
<td>2030 / 2015</td>
<td>3.8</td>
<td>3.9</td>
<td>4.5</td>
<td>2.9</td>
<td>2.5</td>
<td>5.0</td>
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<tr>
<td></td>
<td>Change of Share by Transport Mode</td>
<td>2015</td>
<td>100%</td>
<td>63.8%</td>
<td>19.1%</td>
<td>4.7%</td>
<td>12.3%</td>
<td>0.1%</td>
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<tr>
<td></td>
<td>Average Annual Growth Rate</td>
<td>2015 / 2030</td>
<td>9.3%</td>
<td>9.5%</td>
<td>10.5%</td>
<td>7.2%</td>
<td>6.3%</td>
<td>11.3%</td>
</tr>
</tbody>
</table>
Projects for Logistics Facilities
Projects for Roads Development
Projects for Railway Development

Intermediate Freight Stations Development Projects

Yangon Outer Ring Freight Railway Development

Improvement of Freight Stations in Yangon CBD Area

Freight Station Development Project in Thilawa Area

Thilawa - Bago New Line Development Project

Legend:
- Arterial road network
- Express way
- Railway network
- Inland water network
- SEZ / IZ

Bulk Cargo Railway Freight Improvement Project

Procurement of Locomotive and Container Wagon

Development of Freight Railway Stations/ICD at Yangon and Mandalay

Toegyamgale - Thilawa Railway Improvement Project

Study on Myanmar - Thailand Railway Link
Projects for Inland Water Transport Development
Projects for Port Development

Revision of Port Laws

Sittwe Port Improvement Project

Kyaukpyu Port Improvement Project

Thandwe Port Improvement Project

Pathein Port Improvement Project

Legend:
- Arterial road network
- Expressway
- Railway network
- Inland water network
- SEZ/IIE

Navigation Aid Development Project (specially for Yangon Port)

Mawlamyaing Port Improvement Project

Dawei Port Improvement Project

Myeik Port Development Project

Khawtaung Port Improvement Project
Projects for Air Transport Development
## Proposed Projects and Estimate Cost

### Project List

<table>
<thead>
<tr>
<th>Project</th>
<th>Group A</th>
<th>Group B</th>
<th>Group C</th>
<th>Group D</th>
<th>Grand Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Logistics</td>
<td>9</td>
<td>-</td>
<td>-</td>
<td>-</td>
<td>9</td>
</tr>
<tr>
<td>Road</td>
<td>13</td>
<td>14</td>
<td>10</td>
<td>19</td>
<td>56</td>
</tr>
<tr>
<td>Railway</td>
<td>5</td>
<td>4</td>
<td>4</td>
<td>9</td>
<td>22</td>
</tr>
<tr>
<td>Port</td>
<td>8</td>
<td>6</td>
<td>-</td>
<td>-</td>
<td>14</td>
</tr>
<tr>
<td>IWT</td>
<td>11</td>
<td>6</td>
<td>7</td>
<td>10</td>
<td>34</td>
</tr>
<tr>
<td>Aviation</td>
<td>4</td>
<td>11</td>
<td>11</td>
<td>-</td>
<td>26</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>50</strong></td>
<td><strong>41</strong></td>
<td><strong>32</strong></td>
<td><strong>38</strong></td>
<td><strong>161</strong></td>
</tr>
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</table>

### Project Cost

<table>
<thead>
<tr>
<th>Nos of Project</th>
<th>All Projects</th>
<th>MYT-Plan</th>
<th>Logistics (Additional)</th>
<th>Short Term Project All Sector</th>
</tr>
</thead>
<tbody>
<tr>
<td>Nos of Project</td>
<td>161</td>
<td>108</td>
<td>53</td>
<td>82</td>
</tr>
<tr>
<td>US$ Million</td>
<td>29,089</td>
<td>19,324</td>
<td>9,741</td>
<td>13,115</td>
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<tr>
<td>MMK Billion</td>
<td>39,794</td>
<td>26,435</td>
<td>13,327</td>
<td>17,941</td>
</tr>
</tbody>
</table>

Source: Study Team
NEEDED ACTIONS BY STAGES

INITIAL STAGE (2017~2020)
- Legislation of needed logistics regulations
- Preparation of capacity building program
- Development and preparation of implementation program
- Organizing regulatory body
- Funding arrangement for top priority projects
- Oversee project implementation and execution of top priority projects

IMPLEMENTATION STAGE (2021~2025)
- Coordination among concerned ministries and agencies Overall Project Management
- Funding arrangement
- Oversee project implementation and execution of project monitoring as well as reporting

OPERATION STAGE (2023~2030)
- Monitoring and analyzing implementation progress
- Revision, modification and adjustment of NLMP 2017
- Preparation and formulation of the master plan beyond 2030
Major On-Going and Potential Projects

- Truck Terminal Development in Yangon
- Rural Road Development
- Upgrading Yangon – Mandalay Main Line
- Upgrading of Bago – Mawlamyine, Yangon – Pyay, Mandalay – Mintkyina
- Freight Railway Station in Yangon and Mandalay
- Mandalay Port Development
- Navigation Channel improvement on Ayeyarwaddy, Chindwin and Yangon
- Dalla Dockyard Modernization
- Cross Border Trade Facility
- Thilawa Port Development
- Hanthawady Airport Development
HRD for Logistics Service Providers
UNESCAP ACTIVITIES ON HRD FOR MYANMAR

“Training of Trainers Workshop on Training Fundamentals and Foundation Course on Transport and Logistics”

Total Training of Trainers: 66

1-3 September 2009
17 – 18, August 2010
13 Oct-14 Oct 2011
<table>
<thead>
<tr>
<th>Year</th>
<th>Participants</th>
<th>Times a year</th>
</tr>
</thead>
<tbody>
<tr>
<td>2009</td>
<td>49</td>
<td>1 time</td>
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<tr>
<td>2010</td>
<td>116</td>
<td>3 times</td>
</tr>
<tr>
<td>2011</td>
<td>165</td>
<td>4 times</td>
</tr>
<tr>
<td>2012</td>
<td>181</td>
<td>3 times</td>
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<tr>
<td>2013</td>
<td>97</td>
<td>3 times</td>
</tr>
<tr>
<td>2014</td>
<td>161</td>
<td>3 times</td>
</tr>
<tr>
<td>2015</td>
<td>134</td>
<td>3 times</td>
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<td>2016</td>
<td>65</td>
<td>2 times</td>
</tr>
<tr>
<td>2017</td>
<td>43</td>
<td>1 time</td>
</tr>
<tr>
<td>Total Participant Up to Aug 2017</td>
<td>1011</td>
<td>23 times</td>
</tr>
</tbody>
</table>
Challenges and Issues to be addressed
Issues to be addressed for Trade / Transit Cargo

1. Road condition especially in rural area is poor especially in a rainy season. Damage on goods is problematic during transportation.

2. There exist infrastructure for transportation of goods in various forms such as road, railway, water borne, air however linkage among them are weak or not well planned, so that trucks are dominating the logistics industry.

3. Lay time of transportation equipment (truck, vessel, rail locomotive and wagons) is considerably long thus it pushed up the transport cost.

4. Dwelling time of cargo at port and border posts is considerably long thus it pushes up the transport cost.

5. Material and human loss and damage in considerable volume is foreseen because of shortcoming of transport safety measures.

6. Number of skilled / licensed heavy truck drives and logistics providers are in short to cope with ever increasing number of heavy loaded trucks.
Issues to be addressed for Domestic Cargo

7. Lack of cargo transport and handling capacity of truck terminals, railway, seaport and inland waterway transport.
8. Absence of a domestic cargo manifest system;
9. Weak domestic cargo transport network supporting local industries and farmers.
10. Limited inland waterway development
11. Under utilization of railway transport system
12. Long truck turn around time
13. Low loading ratio of road and inland waterway transport (one way cargo transport) attribute to higher transport cost
14. Low containerization ratio
15. Shortage of heavy loaded trucks and number of skilled drivers
18. Lack of cold chain management systems
19. No modern and well designed warehouses exist (small warehouses are managed by SME as family business)
20. Modernization of Truck Terminal
21. Almost no mechanized handling of cargo
22. Almost no regular/scheduled cargo service on road, rail, water and air
23. Rules and Regulations are necessary to be updated
Issues to be Addressed for International Cargo

1. the Cargo Transfer at Cross-border Trade Facility and Truck Terminal (Mechanized cargo handling)

2. Lack of bounded transport and warehouse
3. A few exporting products
4. Value added industries are necessary
5. Congestion in and around Yangon downtown port terminals
Build foundation for creating strong and sound logistics system by establishing logistics organization; improving multimodal transport, Legislation of logistics services as well as Capacity Building for Logistics Service Providers.

Increase logistics performance and seamless cargo transport at least cost for improving state’s economy and competitiveness by implementing Logistics Facilities, Road, Railway, Aviation and Inland waterway Infrastructure and improving Navigation Channel, Vessels, and Multimodal Hub with the cooperation of private investment, Foreign assistance and State’s budget.

Implement transport and logistics projects in accord with National Transport Master Plan and the National Logistics Master Plan.

Improve crossborder transit facilities, scheduled Container Block Train operation, local port facilities to increase cargo handling productivity and efficiency and public truck terminals.
Thank You