The railway activities of the Port of Hamburg and the Hinterland Traffic

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Hamburg Port Railway

established in 1866

Department of the Hamburg Port Authority

port of Hamburg's rail infrastructure manager

building and operation of railroad facilities

today Hamburg is Europe's most important "rail port"
Hamburg Port Railway
Deregulation

**yesterday**
- infrastructure and transportation in charge of the Hamburg Port Railway
- one carrier

**today**
- one owner and operator of the infrastructure = HPA
- several railroad companies

Today 112 different rail transport companies pay for use of the infrastructure of the HPA.
Port of Hamburg - important railterminals

- Port railway main stations
- Large terminals

- CTB
- EUK
- WHO
- ASE
- CTA
- HP
- HOS
- CTT
- CTS
- HBS

- Port railway main stations
- Large terminals
- DB-Netz
- HPA port railway
## Hamburg port railway – facts

<table>
<thead>
<tr>
<th>Category</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Track</td>
<td>ca 300 km (+ 160 km in private use)</td>
</tr>
<tr>
<td>Switches</td>
<td>ca 850 (+ 600 in private use)</td>
</tr>
<tr>
<td>Engineering work</td>
<td>65</td>
</tr>
<tr>
<td>Gravity sorting systems</td>
<td>3 marshalling humps with 6 switch towers</td>
</tr>
<tr>
<td>Trains per day</td>
<td>&gt;200</td>
</tr>
<tr>
<td>Freight cars per day</td>
<td>ca 5,000</td>
</tr>
<tr>
<td>Railroad companies</td>
<td>112</td>
</tr>
<tr>
<td>Share in cargo handling (port of Hamburg)</td>
<td>ca 30 %</td>
</tr>
<tr>
<td>Share in national rail freight transport</td>
<td>ca 12 %</td>
</tr>
</tbody>
</table>

01.11.2013

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Hinterland of the Port of Hamburg

- 33%
- 44%
- 22%
Port of Hamburg: Modal Split 2012 (Container)

- m. 6.2 TEU via Containership
- m. 2.7 TEU via Short Sea Ship
  - m. 1.8 TEU Feeder
  - m. 1.0 TEU Short Sea

- Deep Sea m. 4.4 TEU
- Port: m. 8.9 TEU
- Short Sea m. 1.0 TEU

- Total Hinterland: m. 5.3 TEU
  - m. 3.3 TEU Truck
  - m. 2.0 TEU Rail
  - m. 0.1 TEU Barge

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Especially in the last decade, annual growth in container transport by the port railway has been outstanding.
In 2011, we set another new record and we expect further growth in the future.

220 freight trains per day (2010)

400 freight trains per day (medium term = 2020 et seq.)
North Range Ports: Intermodal Rail Traffic Development

Source: Port of Rotterdam Authority, Hamburg Port Authority, bremenports, Antwerp Port Authority, HHM

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Hamburg main rail axes
Intermodal railway services via Hamburg

Port of Hamburg
Europe’s largest rail freight hub:
All in all more than 1200 trains per week,
thereof more than 900 intermodal trains!

Weekly container train connections from/to Hamburg inc. Terminal Billwerder (Stand: 06/2012).

- **Germany**: 620 trains/week
- **Denmark**: 6 trains/week
- **Czech Republic**: 100 trains/week
- **Austria**: 80 trains/week
- **Italy**: 64 trains/week
- **Poland**: 39 trains/week
- **Switzerland**: 32 trains/week
- **Austria**: 11 trains/week
- **Hungary**: 10 trains/week
- **Lithuania**: if required
- **Russia**: if required
- **Ukraine**: if required
- **Poland**: 39 trains/week
- **Czech Republic**: 100 trains/week
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More Peaks in Hinterland Traffic Caused by Increasing Loading Capacities of Ocean-Going Vessels

Handling of 8,000 TEU at the Ocean-Going Vessel (13,000 TEU Class)

ca. 48 h

One Ocean-Going Vessel

Assumptions
Share of the modes of transport according to Port of Hamburg's modal split (containerised cargo).
Capacity by mode of transport:
- 90 TEU per Barge
- 75 TEU per Train
- 1.6 TEU per Truck

Main challenge for landside infrastructure – trains & barges would be easier to handle!

Prompt handling of hinterland traffic up to 5,045 TEU:

- 3,120 TEU via Truck → 2,000 Trucks
- 1,830 TEU via Rail → 25 Trains
- 100 TEU via IWV → 2 Barges

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Key Projects at Hamburg Port Railway area

1. Kapazitätserhöhung Verbindungsgleise im Raum Waltershof
2. Umbau Bhf Waltershof
3. Zweigleisige Anbindung der Containerterminals (CTB: dreigleisig)
4. Gleisanbindung Altenwerder (4. Stufe)
5. Sicherung Vorstellfunktionen Bhf Alte Süderelbe
6. Südanbindung Altenwerder
7. Anbindung Seehafenbahnhof (langfristig)
8. Ersatzbau zweigleisige Kattwyk-Bahnbrücke
9. Sicherung Vorstellfunktionen Seehafenbahnhof (DB)
10. Umbau Knoten Harburg
11. Ausbau Zweigleisigkeit (HPA/DB)
12. Kreuzungsbauwerk Wilhelmsburg
13. Sicherung Vorstellfunktionen Wilhelmsburg (langfristig)
14. Ersatzbau Rethebrücke
15. Umbau und Modernisierung Bhf Hamburg Süd
16. Puffergleise Rothenburgsort
17. Vorstellgruppe Ross
18. Zweigleisige Durchfahrt Bhf Hohe Schaar
19. Lokservicestelle
In the last three years we invested heavily in infrastructure refurbishment projects.

example:
Rethebridge – world’s major double flap bridge
We have developed an integrated IT system to optimise communication and production for all partners.
Thank you for your attention!

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