

# INFRASTRUCTURE

## New Opportunities in Brazilian Market



**1. BNDES Highlights**

**2. How we work**

**3. Opportunities in the New Concession Program**

**1. BNDES Highlights**

2. How we work

3. Opportunities in the New Concession Program

- ↪ **Founded** on June 20th, 1952
- ↪ 100% **state-owned** company under **private law**
- ↪ **Key instrument** for implementation of Federal Government's **industrial and infrastructure policies**
- ↪ Main provider of **long-term financing** in Brazil
- ↪ Emphasis on financing **investment projects**
- ↪ Support to **micro, small and medium-sized** companies
- ↪ Support to **Export and Internationalization of Brazilian companies**

# Time Line



50's

60's

70's

80's

90's

00's

Today

Infrastructure

Heavy Industry – Consumer Goods

Technological Development

Imports  
Substitution

Energy

Agribusiness

Privatization  
Program

Exports

Urban and Social Development

Social Inclusion

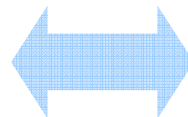
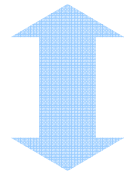
Innovation

Sustainability

Small Business

# Relationship with other Government Agencies

**MDIC**  
Ministry of  
Development, Industry  
and Foreign Trade



**MF**  
Ministry of Finance

National Monetary Council

Central Bank of Brazil

Securities Exchange  
Commission

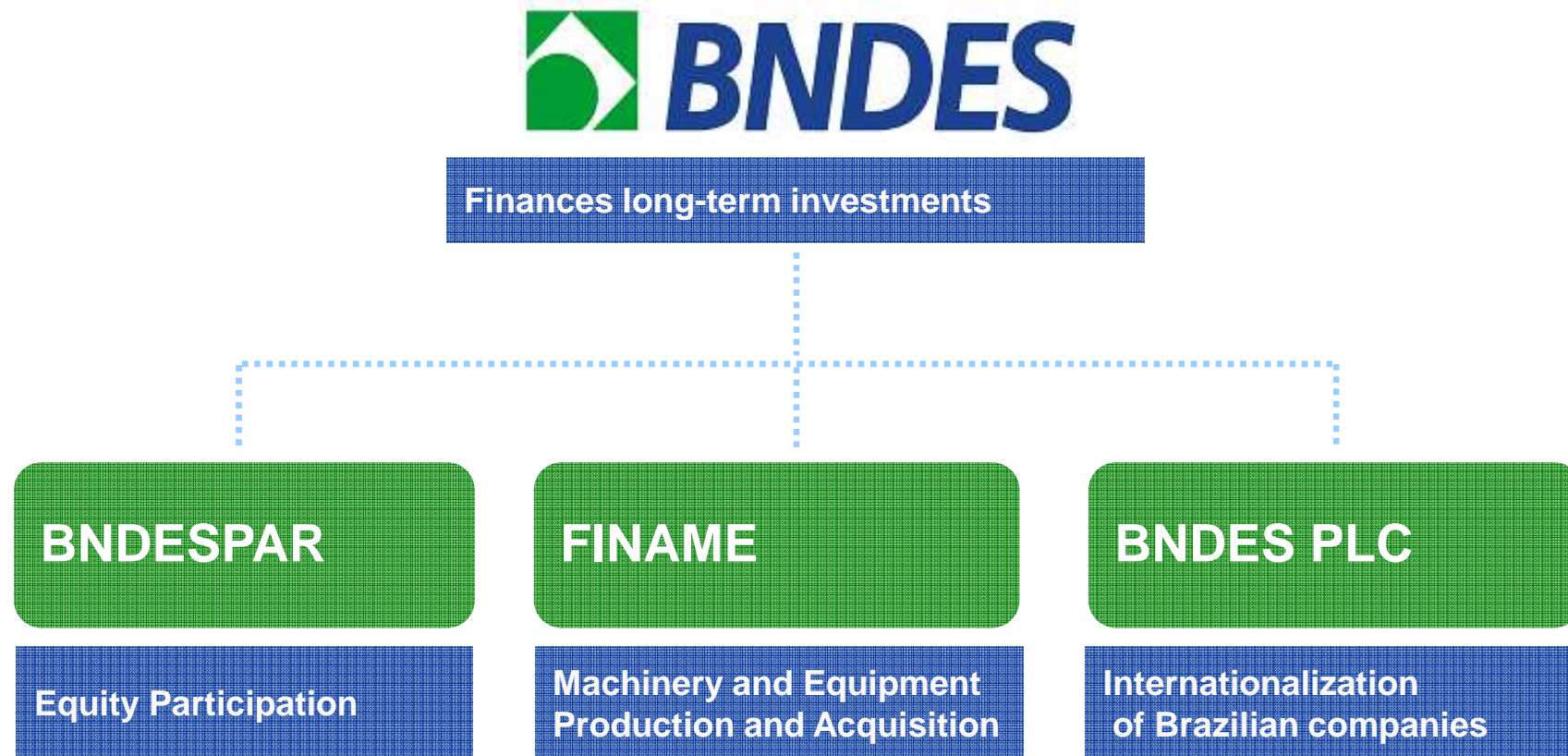
Federal Taxation Office

National Treasury

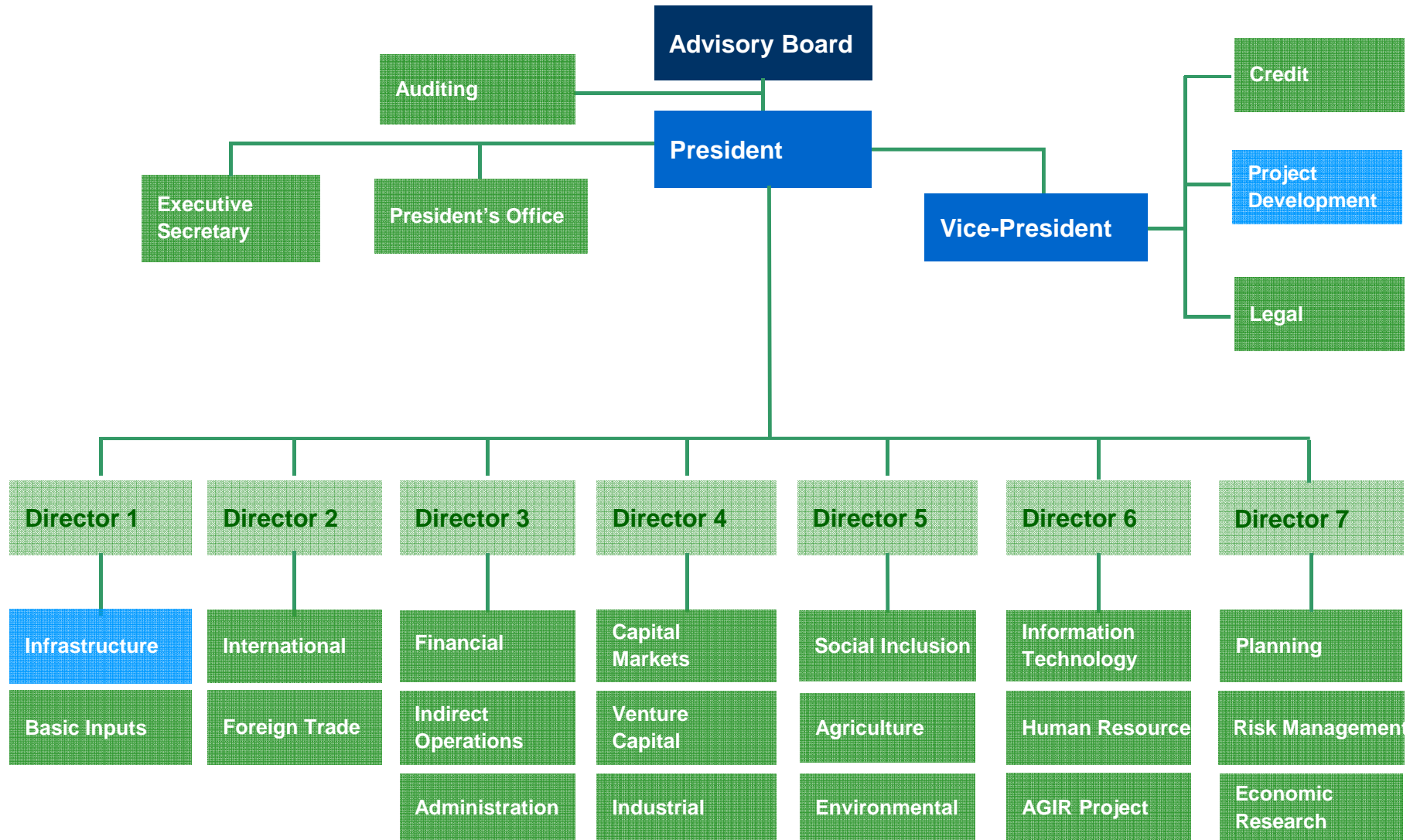
Private Insurances Agency

**TCU**  
Federal Court of Auditors





# Organizational Chart

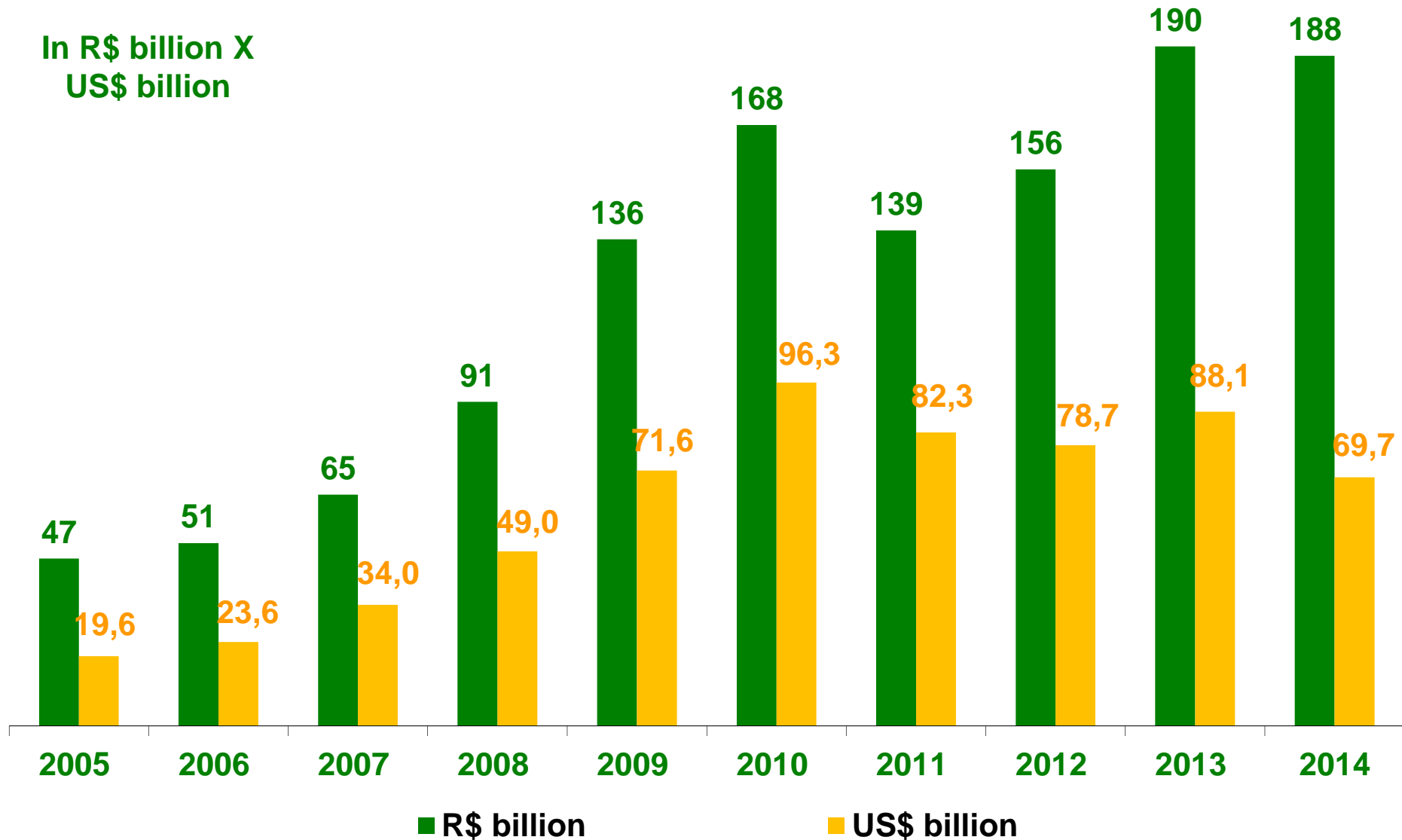




# Annual Disbursements (R\$ X US\$)



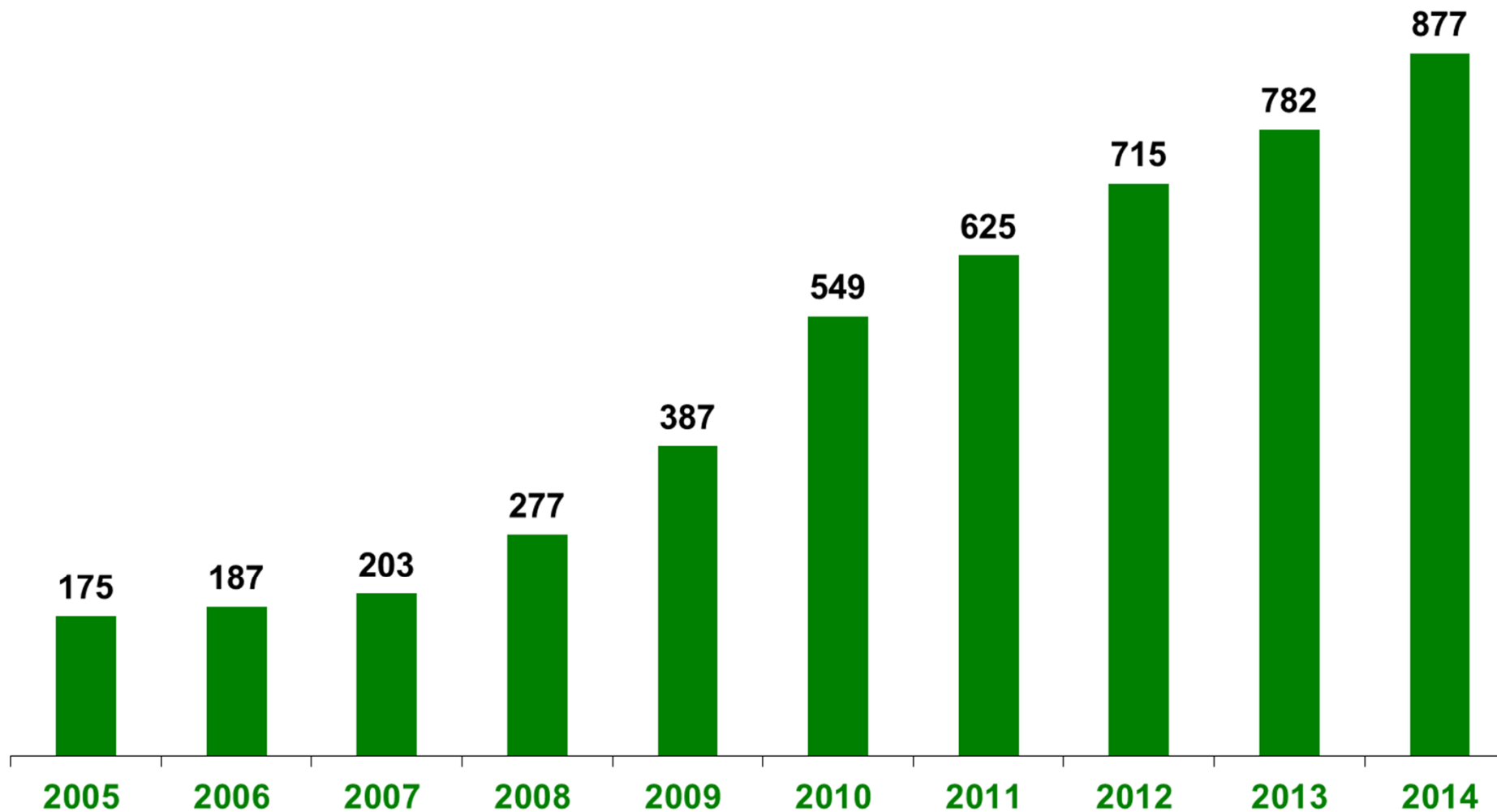
In R\$ billion X  
US\$ billion



# Assets



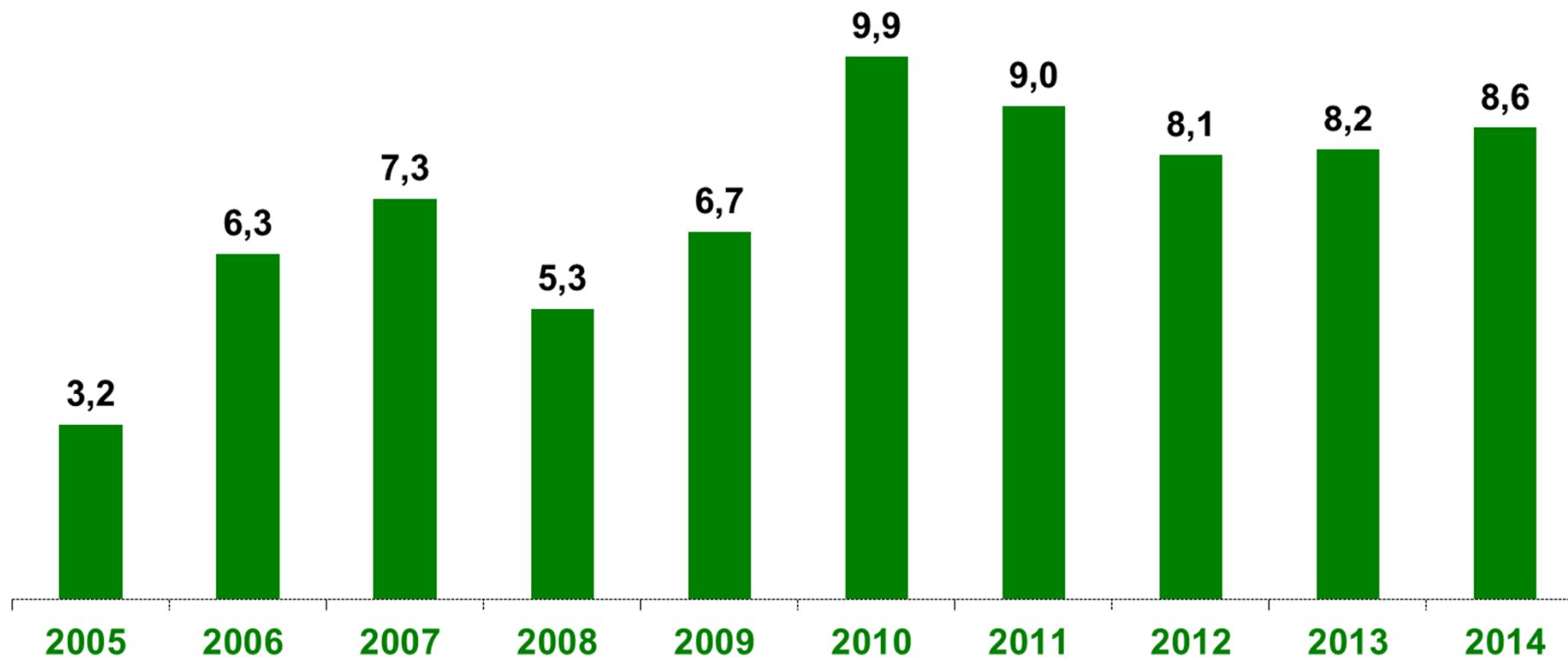
In R\$ billion



# Net Profit



In R\$ billion



# BNDES vs. Other Development Banks



Indicators	2013			
	BNDES <i>Brazil</i>	CDB <i>China</i>	KfW <i>Germany</i>	JFC <i>Japan</i>
Assets (US\$ billions)	363,4	1.331,3	619,7	260,4
Loan Portfolio (US\$ billions)	263,5	1.162,3	528,8	222,8
Net Profit (US\$ billions)	3,6	13,0	1,7	(2,9)
Non-performing loans ratio (%)	0,01	0,48	0,13	2,98
Return on Assets (%)	1,01	1,02	0,27	(1,13)
Return on Equity (%)	15,34	15,07	6,21	(6,84)
Foundation	1952	1994	1948	2008
Number of Employees	2.859	8.468	5.374	7.361

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2.1 Infrastructure Financing

2.2 Capital Market - BNDESPAR

2.3 Project Structuring

3. Opportunities in the New Concession Program

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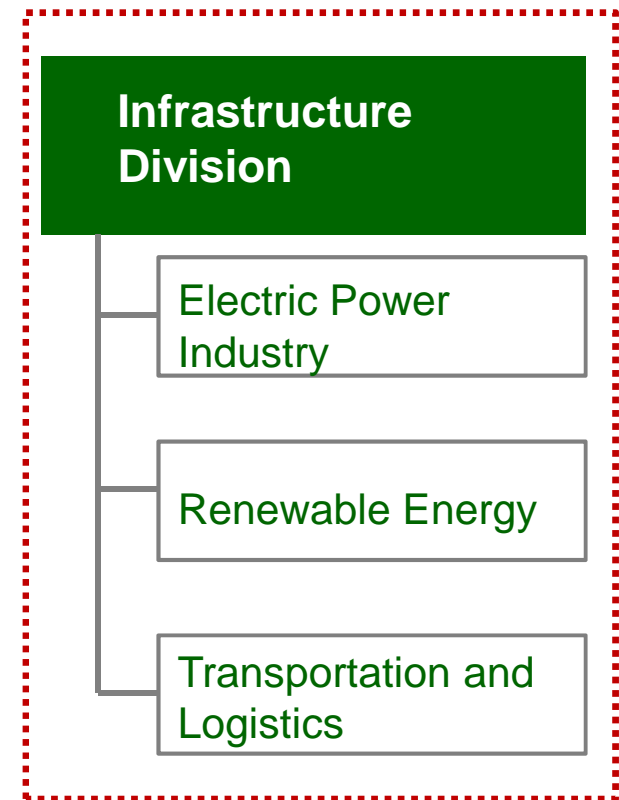
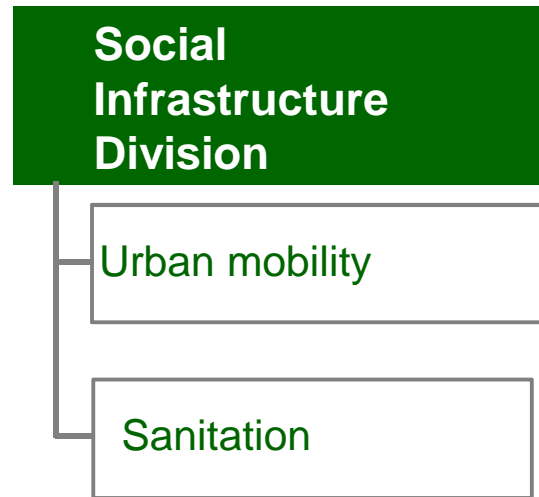
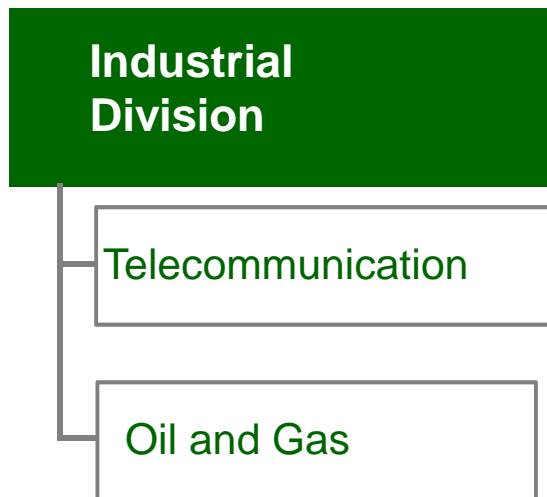
3. Opportunities in the New Concession Program

# Infrastructure Division

## *Understanding BNDES' structure*

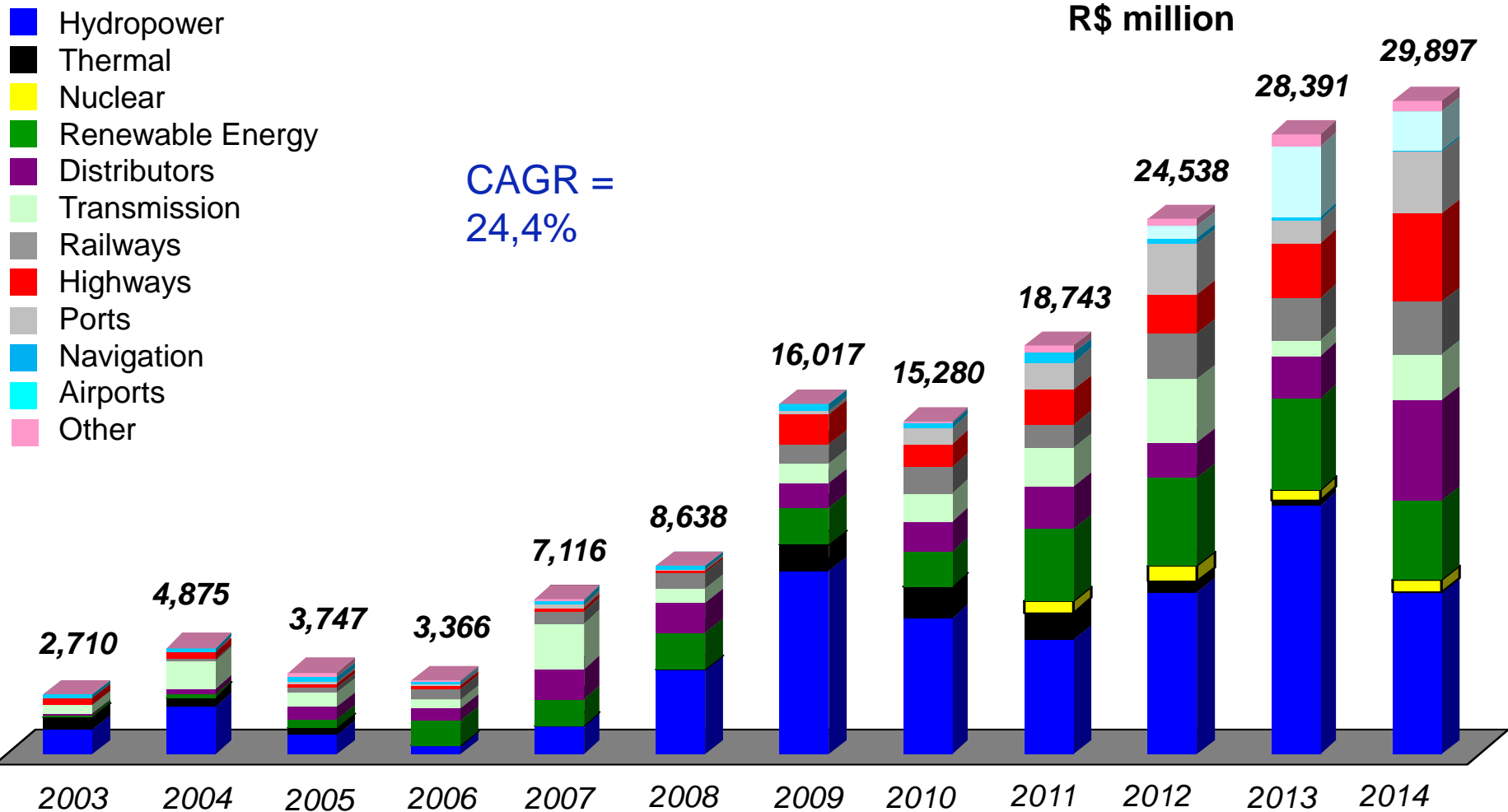


**BNDES' Infrastructure Division comprises only part of the segments usually categorized as "Infrastructure"**



# Infrastructure Division

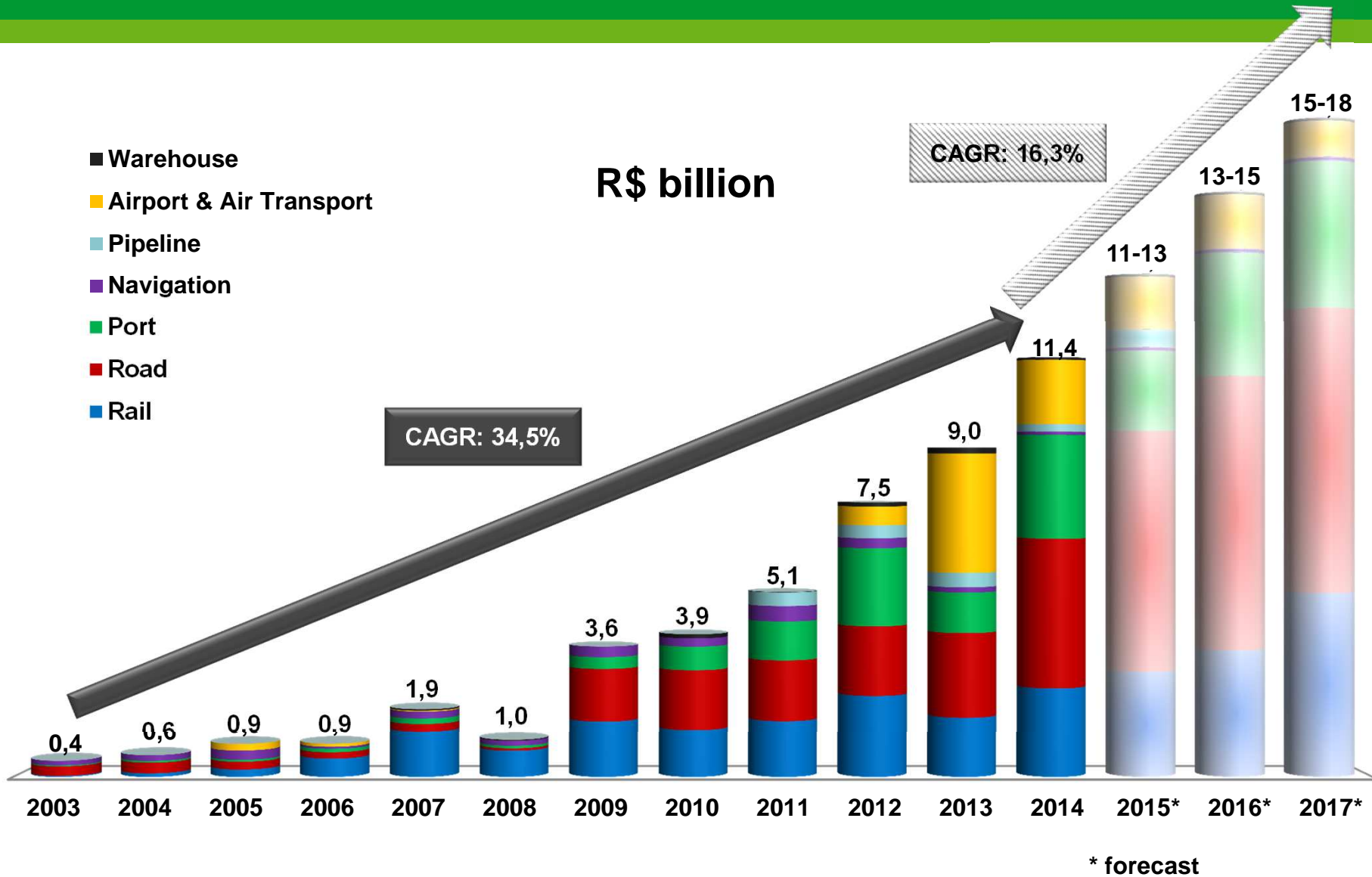
## Annual Disbursement





# Disbursements in logistics

*Strong growth trend*



# Infrastructure Division

## Portfolio of projects



R\$ Thousands

	Sector	Number of Projects	Value of Support	Total investment
Electric Power Industry	Generation	26	63.259.266	100.618.829
	Transmission	65	17.219.733	32.905.430
	Distribution	79	17.696.826	34.656.600
	<b>Subtotal</b>	<b>170</b>	<b>98.175.824</b>	<b>168.180.858</b>
Renewable Energy	Wind Power	72	24.386.149	42.610.152
	Cogeneration	10	1.068.309	1.414.244
	Small Hydro	27	1.680.860	2.916.570
	<b>Subtotal</b>	<b>109</b>	<b>27.135.318</b>	<b>46.940.966</b>
Transportation and Logistics	Roadways	43	34.307.800	64.510.666
	Railways	17	12.190.543	35.503.329
	Ports	24	10.291.033	17.932.467
	Airports and Air transport	8	10.547.760	15.800.907
	Pipeline Transportation	1	4.101.400	8.690.000
	Shipping Industry	7	1.556.066	2.454.230
	Terminals & Warehouses	12	778.732	1.053.014
	Others	8	557.606	1.511.977
	<b>Subtotal</b>	<b>120</b>	<b>74.330.940</b>	<b>147.456.591</b>
<b>TOTAL</b>		<b>399</b>	<b>199.642.082</b>	<b>362.578.415</b>

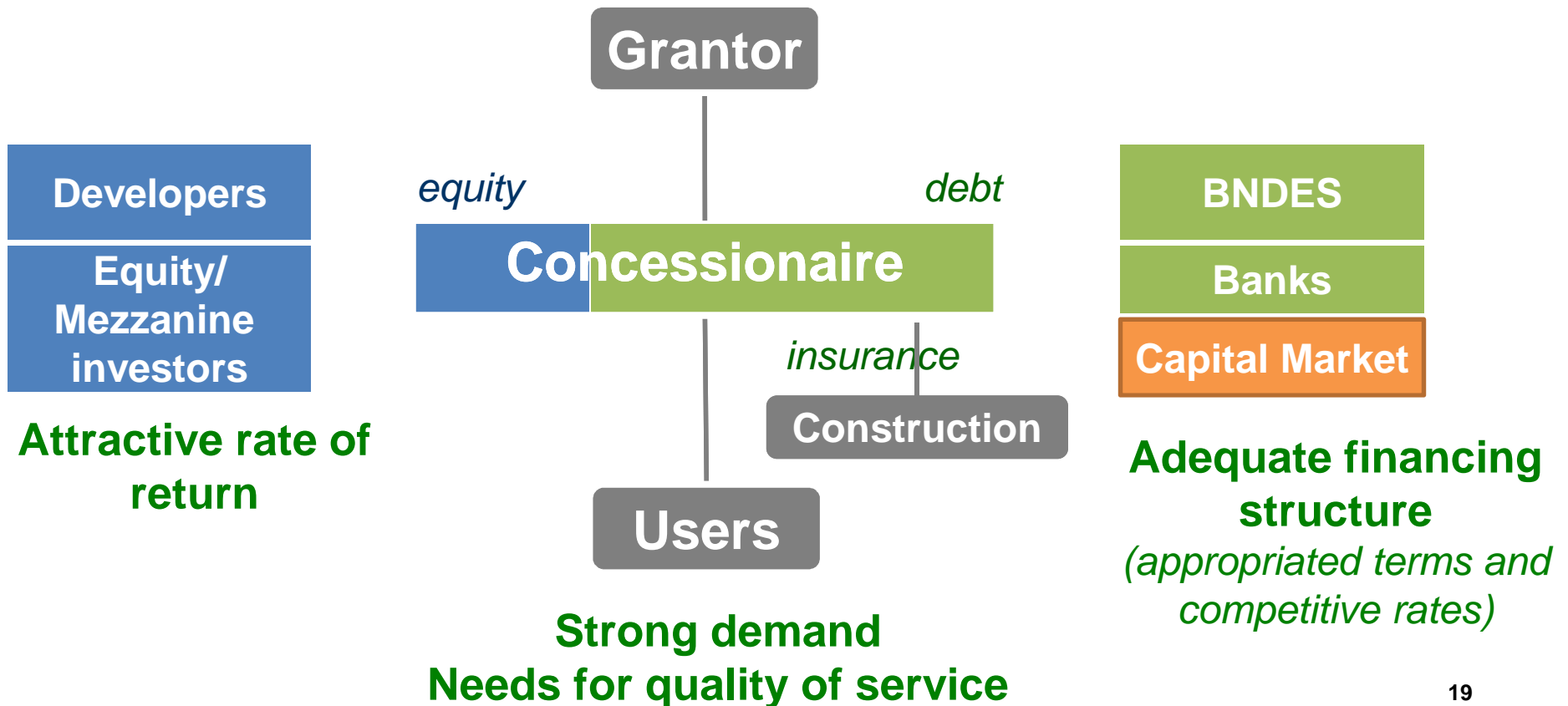
Operations in disbursement and approved (66%), Analysis (27%) and in consultation phase (7%)

# Framework conditions for infrastructure financing



## Appropriate risk allocation and a balanced structure of collaterals

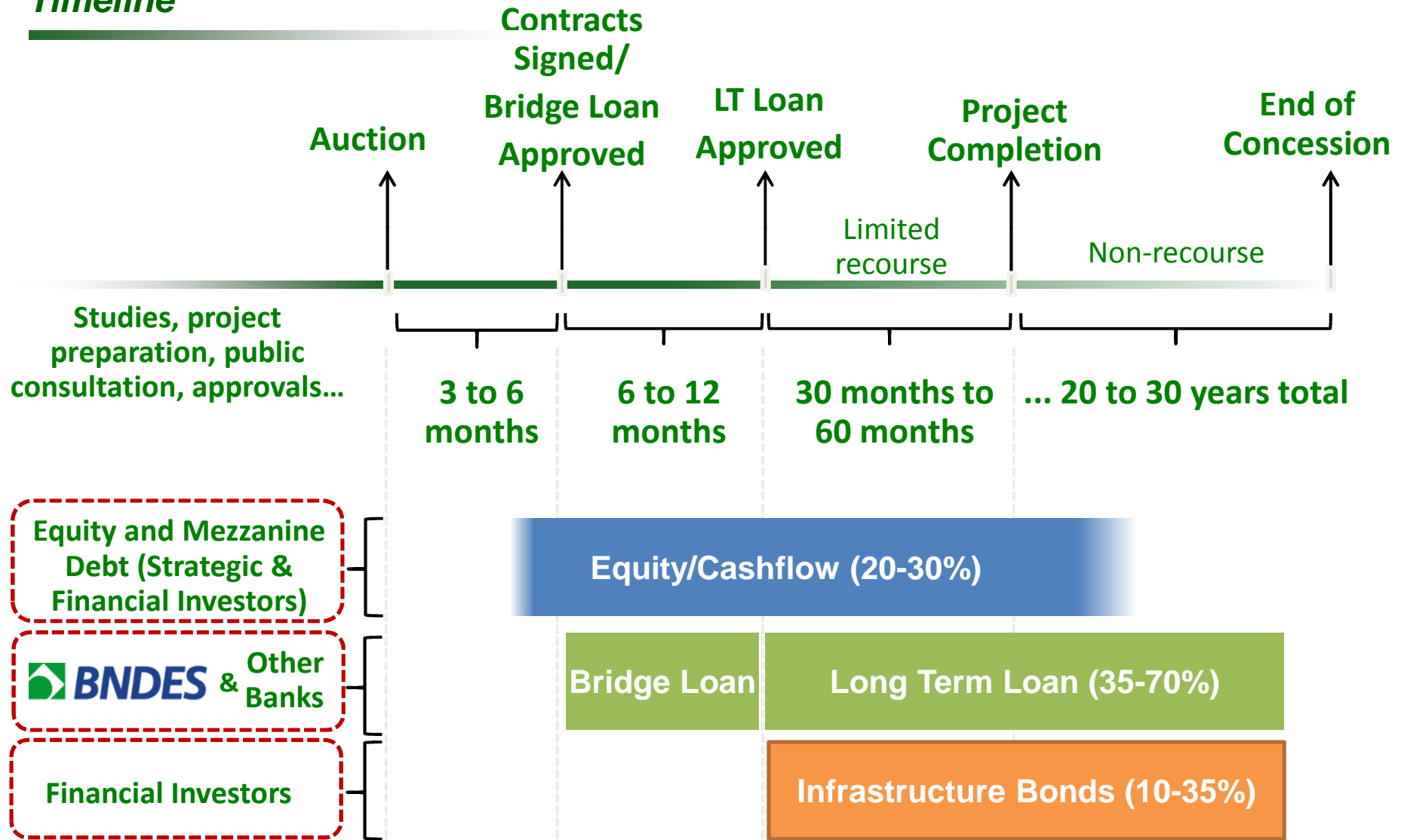
- ↪ Economic and legal stability
- ↪ Non manageable risks assumed by the granting authority
- ↪ Detailed engineering information (reducing construction risk)
- ↪ Environmental licensing risk



# Standard project finance timeline

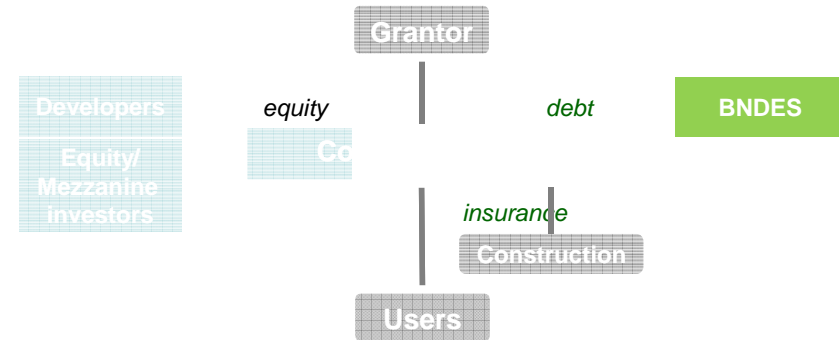


## Timeline



# Basic conditions for financing logistics

**BNDES Finem**



## Direct operation:

$$\text{Financial cost TJLP} + \text{Basic spread: 1,5\% p.a.*} + \text{Credit risk rate*}$$

## Indirect operation (on lending):

$$\text{Financial cost TJLP} + \text{Basic spread: 1,5\% p.a.*} + \text{Financial intermed. 0,5\% pa} + \text{Financial agent's spread}$$

*\* up to 2.87% pa in accordance with company's rating*

Term: up to 20 years

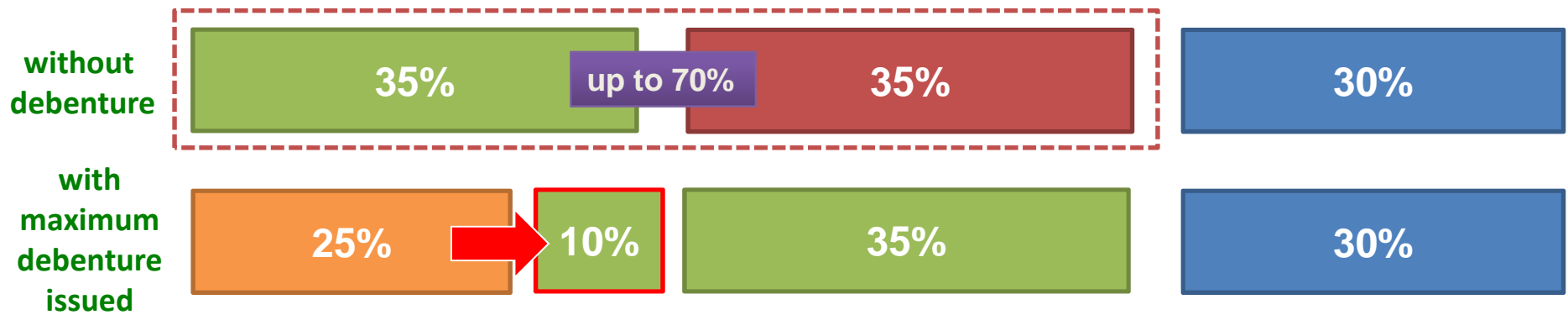
## Bridge Loan:

- Up to 30% of the Long Term debt
- Corporative or Bank collaterals
- Term: 18 months

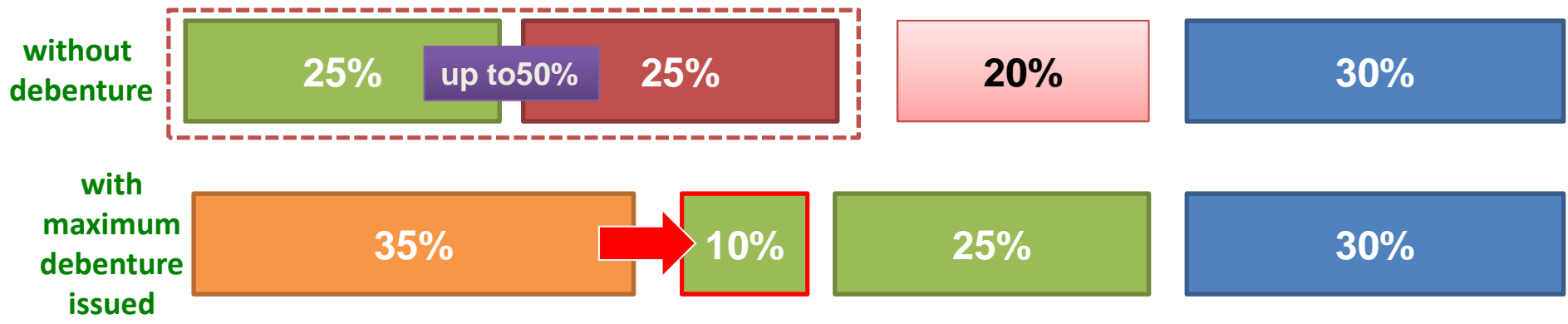
\* 1,2% pa. for railways and waterways.

# 2015 enhanced financing conditions: all in costs can be reduced up to 200 bps

## TOLL ROADS

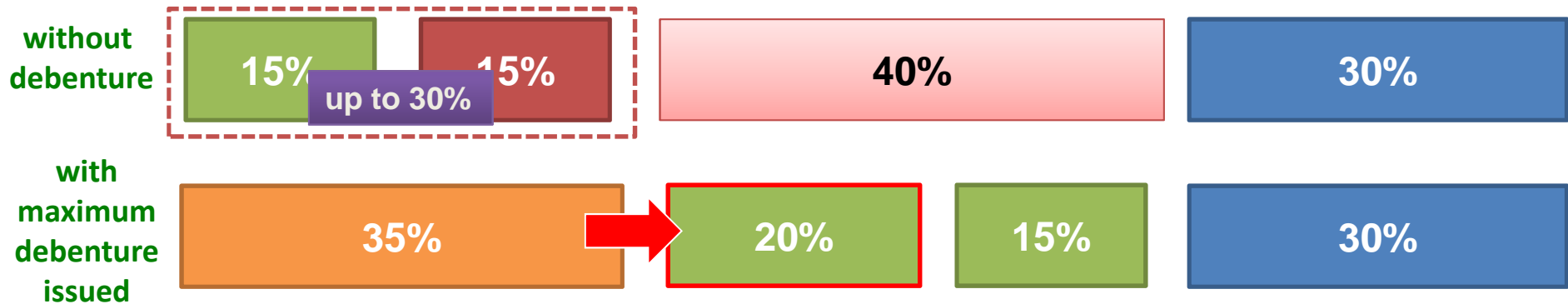


## PORTS

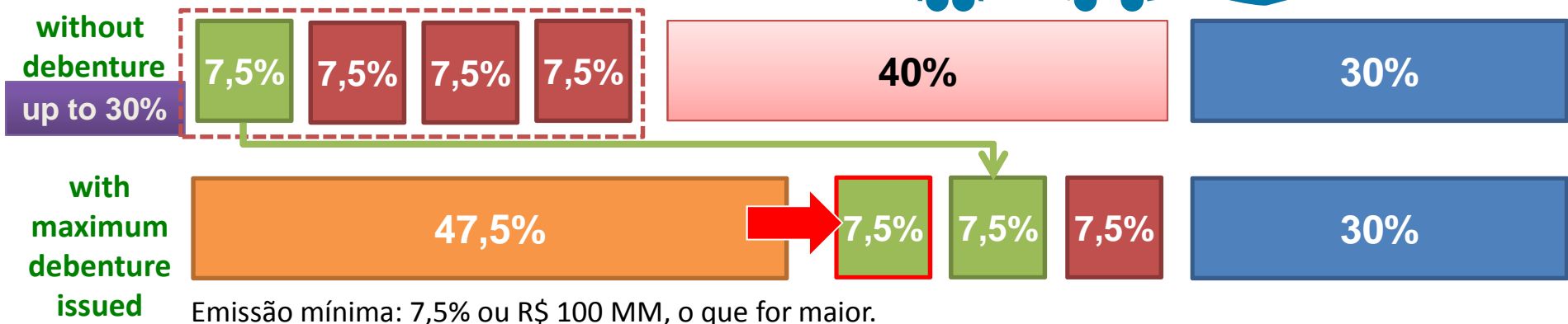


# 2015 enhanced financing conditions: all in costs can be reduced up to 200 bps

## AIRPORTS



## TOLL ROADS/AIRPORTS – following rounds




# 2015 enhanced financing conditions: all in costs can be reduced up to 200 bps

## RAILWAYS and WATERWAYS



## PIPELINE and THIRD-PARTY LOGISTICS



-  Finem TJLP
-  TJLP additional (Pro-Logistica)
-  Finem Market Associate
-  Debenture of Infrastructure
-  Equity/ Cash Flow
-  Finem Market Optional (others sources)



## ↪ With bond issuance

↪ Shared guarantees

↪ Cross-default

↪ Amortization curve to be based on French Amortization System (Price Table) instead of Constant Amortization System.

↪ Increase of TJLP participation

↪ Liquidity support

### General Structure

#### *Loan Tenure*

- ↗ Debt service account (3 installments)
- ↗ Pledge of the SPC's shares
- ↗ Pledge of receivables and rights (including any indemnity payment)
- ↗ Step in rights

#### *Pre-Completion*

- ↗ Corporate Guarantee
- ↗ Bank Guarantee
- ↗ **Equity Support Agreement**
- ↗ **Package of insurance**

#### *Post-Completion*

- ↗ Operational and Financial Covenants

\* Appropriate risk allocation allows a customized and balanced collateral structure

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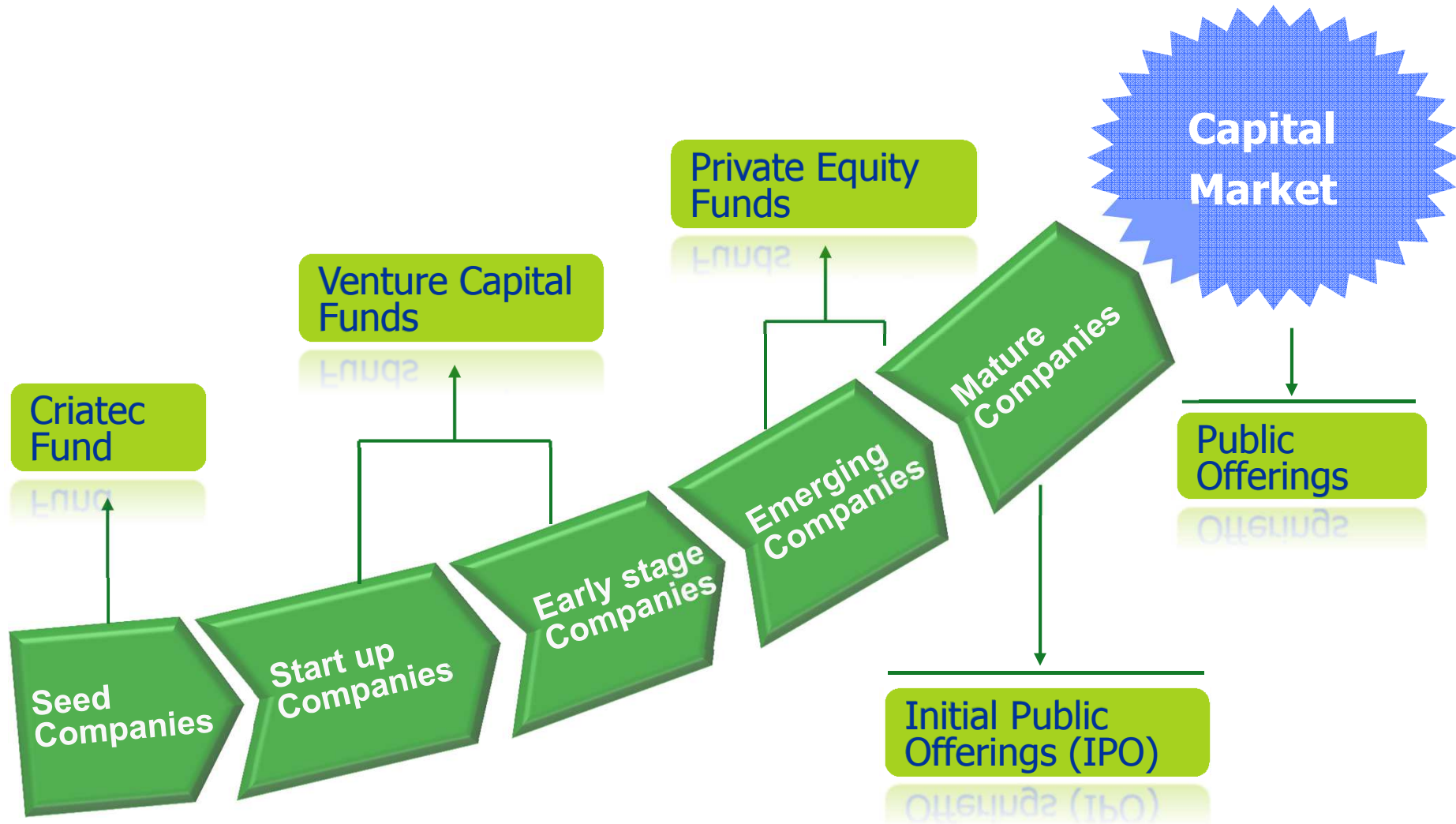
2.3 Project Structuring

3. Opportunities in the New Concession Program

## The BNDESPAR plays a key role owing to:

- ↗ Its commitment to long-term projects.
- ↗ The size and quality of its portfolio.
- ↗ Its performance in moments of higher volatility in the market.
- ↗ Its capacity to attract other investors.
- ↗ Its focus on corporate governance.
- ↗ Its capacity to invest in all market sectors.

# BNDESPAR Chain of Investment

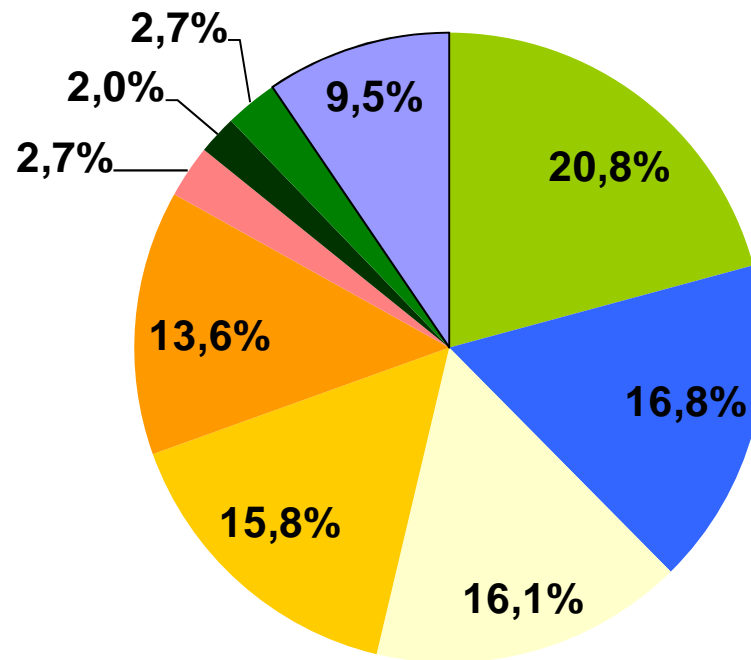


# BNDESPAR Equity Portfolio by Sector



On March, 31 2015

*Portfolio  
US\$ 21,3 billion*



■ Oil and Gas  
■ Electricity  
■ IT

■ Pulp and Paper  
■ Mining  
■ Investment Funds

■ Food  
■ Logistics  
■ Others

# BNDESPAR Equity Infrastructure Portfolio



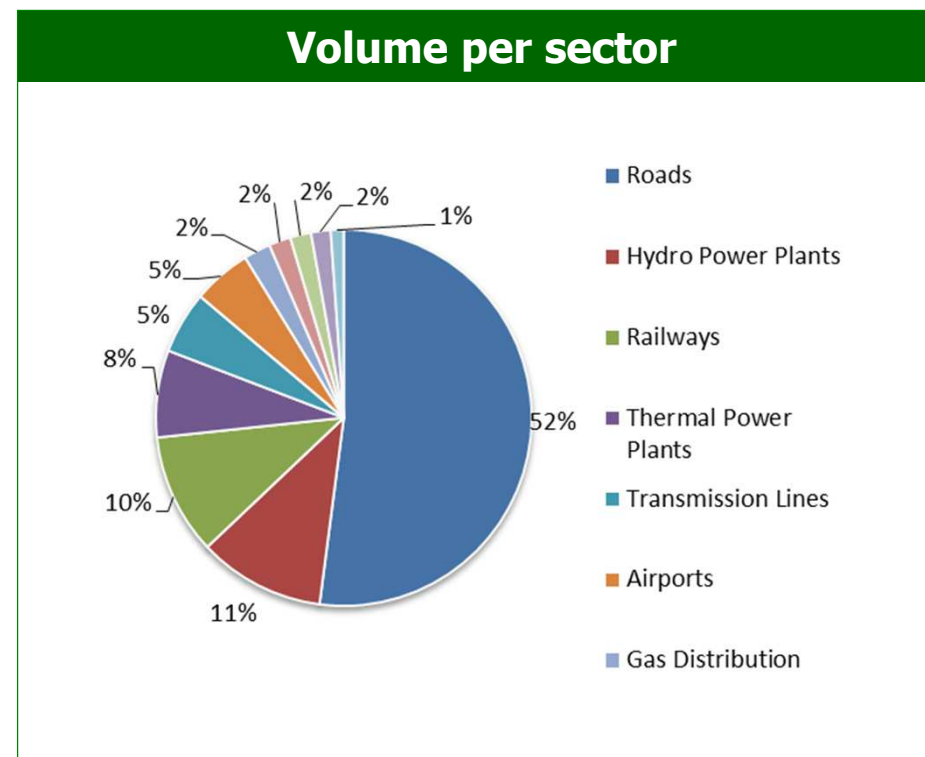
Sector	Companies	R\$ million	% Portfolio
Energy	AES Tiete e Eletropaulo (via Brasileira), Eletrobras, Copel, CPFL, Cemig/AGC Energia, Light, Renova, Taesa, Equatorial, Odebrecht Energia, CEG and others	11.764	17,2%
Logistics	Odebrecht Transport, Rumo (ex ALL) e Cosan Log, Ecorodovias and others	1.861	2,7%
Sanitation	CAB Ambiental and others	330	0,5%
Funds	FIPs: Brasil Energia, Angra Infra-estrutura, Infra Brasil and others	786	1,1%
<b>Infra-structure Total</b>		<b>14.741</b>	<b>21,6%</b>

➤ *Opportunities of coinvestment in long term projects in Brazil - partnership with BNDESPAR*

# Infrastructure Bonds Issues



Sector	Volume (R\$ million)	# Issues
Roads	9.289	24
Hydro Power Plants	1.942	7
Railways	1.851	3
Termhal Power Plants	1.335	3
Transmission Lines	956	7
Airports	900	3
Gas Distribution	412	1
Wind Power Plants	336	7
Ports	321	1
Small Hydro Power Pl	300	2
Sanitation	200	1
<b>Total</b>	<b>17.842</b>	<b>58</b>



Source: Anbima (june, 2015)

- *Issuance of Infrastructure bonds amounted to R\$ 17,8 billion from 2010 to 2015*
- *Main issuers were Roads, Hydro Generation and Railways Companies*



Sector	Companies Bonds - Public Offerings	R\$ million
Energy	Cemig, Taesa, Eecc, Svp, Saesa, Renova Eolica, Raizen and others	1.598
Airports	Guarulhos, Viracopos	481
Highways	Rota das Bandeiras, Concessionária Auto Raposo Tavares, Autovias, Ecorodovias and others	407
<b>Total</b>		<b>2.485</b>

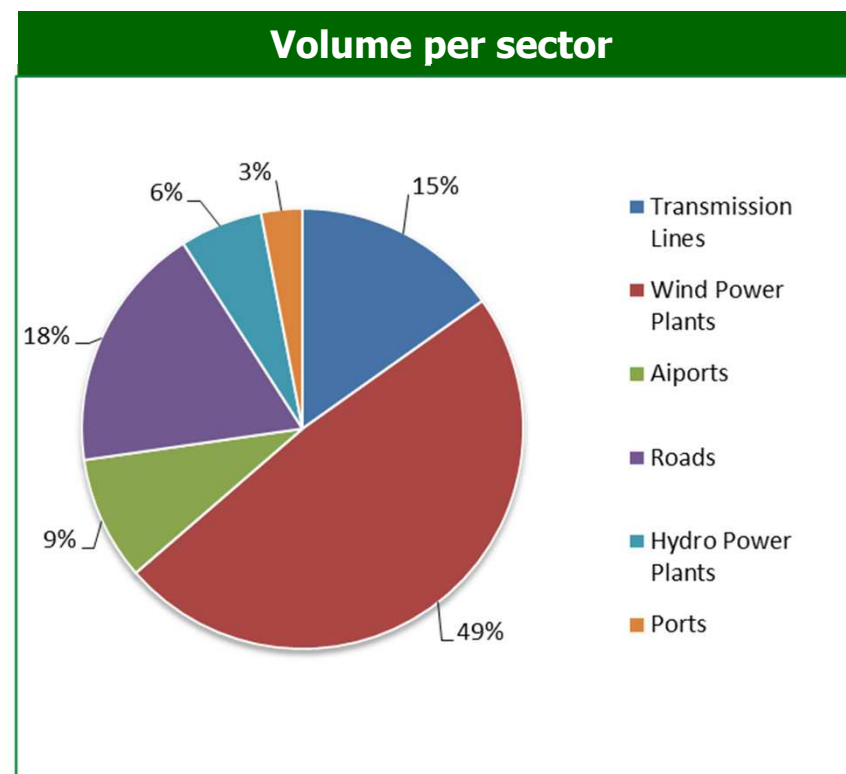
↗ *BNDES acquired ~30% of infrastructure bonds in brazilian public offerings*

# Infrastructure Bonds Pipeline



The projects pipeline for 2015/16 estimate 33 motivated operations,  
which totalize **R\$ 3,8 billions in bonds.**

Sector	# Issues	Estimate Volume (R\$ Millions)
Transmission Lines	5	705
Wind Power Plants	16	979
Aiports	3	330
Roads	6	1313
Hydro Power Plants	2	324
Ports	1	230
<b>Total</b>	<b>33</b>	<b>3.881</b>



Source: BNDES (march, 2015)

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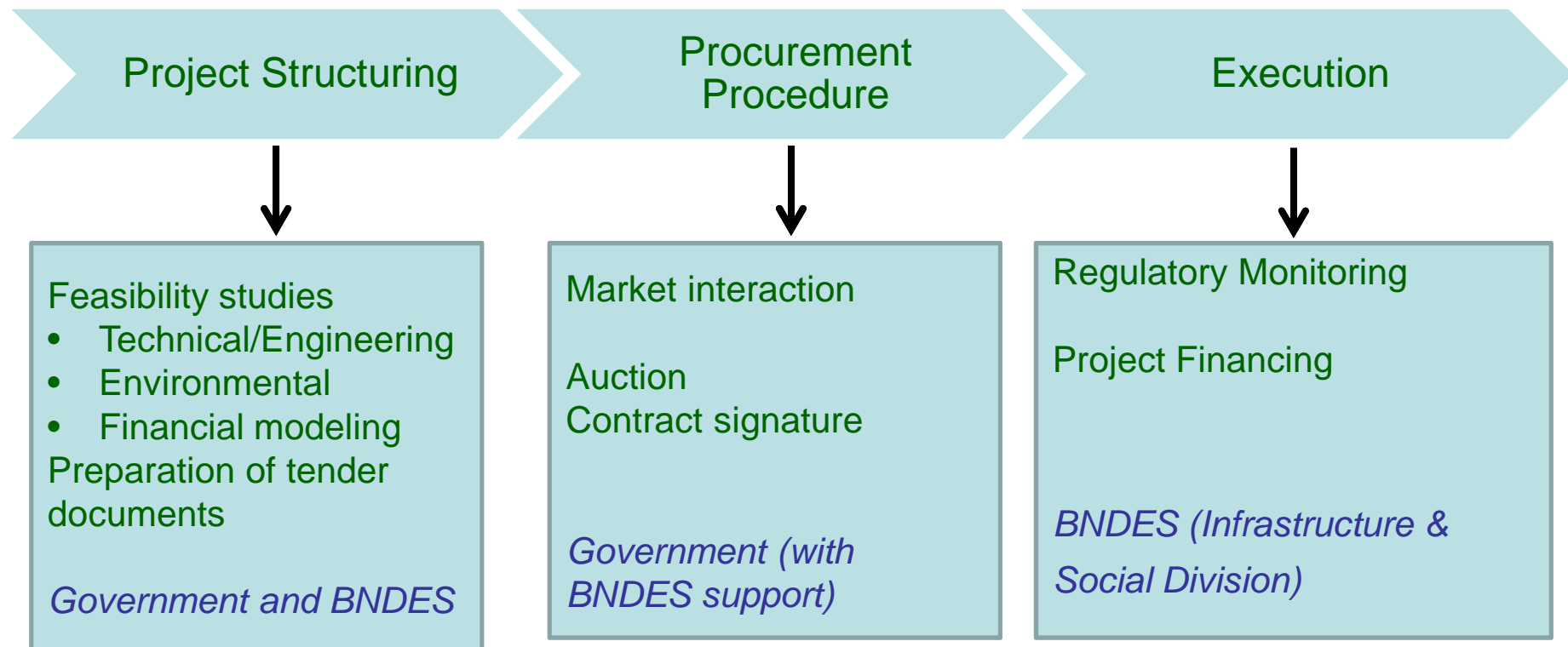
3. Opportunities in the New Concession Program

# Project Structuring Process



BNDES's Project Development Division is responsible for structuring projects of public concessions and PPPs for the Federal Government, States and Municipalities.

The activity called "project structuring" is meant to be prior to project deployment and must not be confused with the traditional activity of BNDES financing to ventures.



# Mechanisms of Project Structuring @BNDES



**Project Structuring Fund  
FEP**



**Brazilian PSP Development  
Program**



**Brazilian Project Structuring  
Company**



Environment  
Assessment

Project Structuring

Procurement Phase

## ↪ Advisory

↪ Background in infrastructure structuring. BNDES team has been helping central and local governments to develop their Concessions and PPP projects in the last 8 years:

- ↪ Project Structuring
- ↪ Financial structuring solutions
- ↪ Legal and regulatory risk
- ↪ Procurement Procedures

### *PDD Projects*

- ↪ 35 structured (24 concluded)
- ↪ US\$ 21.3 billion of estimated CAPEX
- ↪ 86% success rate

## ↪ Market sounding

↪ Fostering possible partners to the SPC or future investors

## ↪ Sectorial studies developed:

- ↪ Exploration and production of Oil & Gas
- ↪ Aviation Sector Study / Restructuring of INFRAERO
- ↪ Bioceanic Railway Corridor
- ↪ Port Sector Study
- ↪ Urban Mobility (Florianópolis / SC)

## ↪ Brazilian PPP Market Presentations

# Project Development Division - Project Portfolio



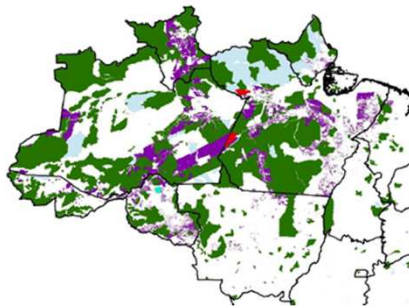
Basic Health Units



Image Diagnostics Center



Airports Concessions



Forest Concessions



Highways Concessions



Sewage and Water treatment



Hospitals



Elementary and Infant-school Education

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# Opportunities in Brazilian Concession Program

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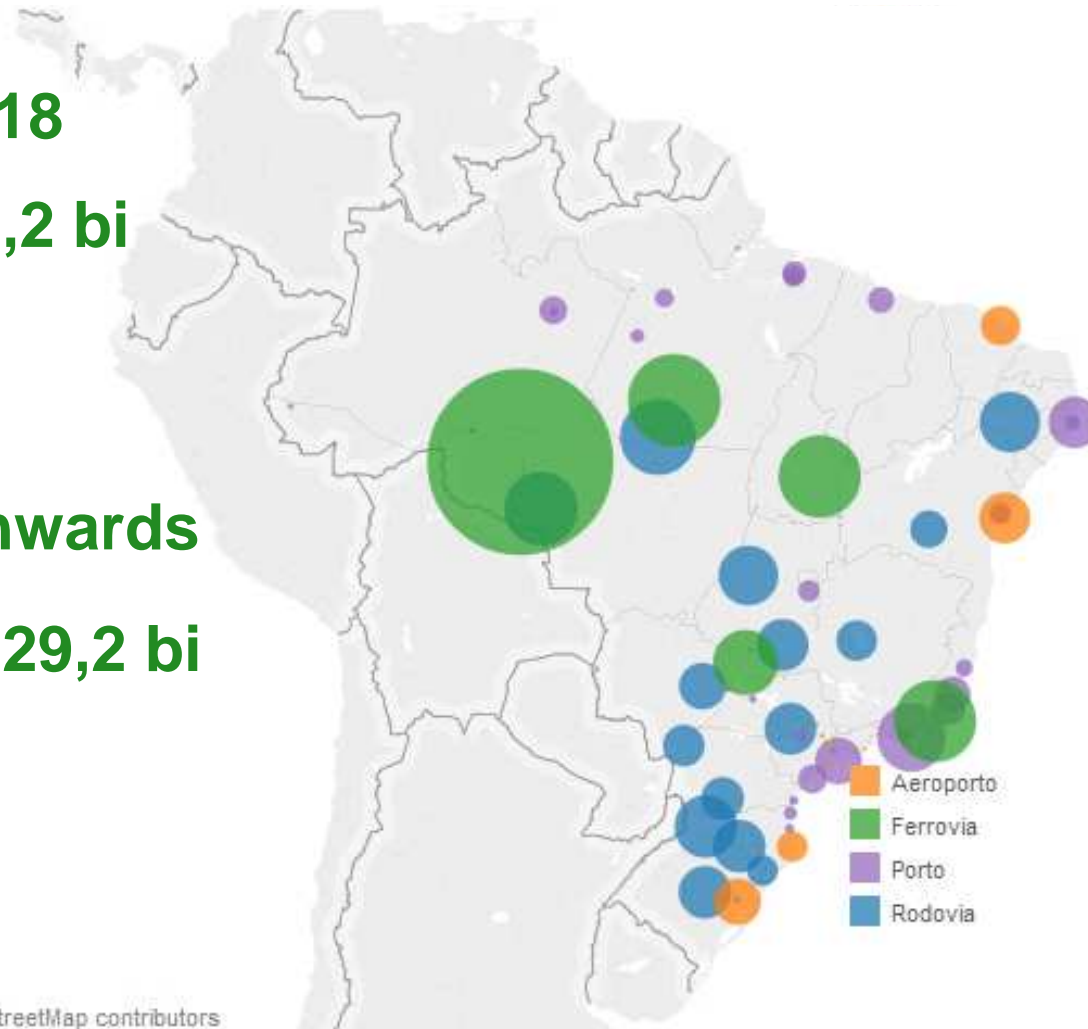
## Total estimated investments: R\$ 198,4 bi

2015 - 2018

 R\$ 69,2 bi

2019 onwards

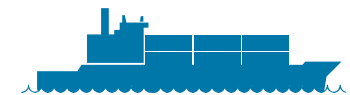
 R\$ 129,2 bi



 R\$ 66,1 bi



 R\$ 86,4 bi



 R\$ 37,4 bi



 R\$ 8,5 bi

# Expected timeline of opportunities in infrastructure



Equity or Mezzanine Debt

	2015	2016	2017
Toll roads		① ② ③	④
Airports	⑤	⑥	
Ports		⑦	⑧
Railways		⑨	

- ① PIL 2012: **6 concessions recently granted** still have huge investments to perform (BR 153, BR 163-MT, BR 060/153/262, BR 040, BR 163-MS, BR 050-MG/GO)
- ② PIL 2015: first round of future bids will have **4 new concessions** (public consultation starting soon)
- ③ PIL 2015: **additional investments in 12 existing concessions** (ammendment agreements)
- ④ PIL 2015: second round of future bids might includes **up to 11 toll roads** (studies to be started through RFPs)
- ⑤ Concessions granted: **restructuring and/or new investments** to be done (Brasília, Natal, Viracopos, Guarulhos, Galeão e Confins)
- ⑥ PIL 2015: **4 new concessions** – Salvador, Porto Alegre, Fortaleza and Florianópolis (studies to be started)
- ⑦ PIL 2015: first block of **new leases** (future bids), **private terminals** or **renewing of existing leases**
- ⑧ PIL 2015: second block of new leases (future bids) or private terminals
- ⑨ PIL 2015: future bids for extension of **North-South** and **new railways (grains transportation** from Mato Grosso)

# Expected timeline of opportunities in infrastructure



**Project bonds**

	2015	2016	2017	2018
Toll roads		①	②③	④
Airports		⑤	⑥	
Ports			⑦	⑧
Railways		⑨		

- ① Existing concessions with investments to perform (Arteris' concessions and 6 toll roads from PIL 2012)
- ② PIL 2015: first round of future bids will have **4 new concessions** (public consultation starting soon)
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- ⑧ PIL 2015: second block of new leases (future bids) or private terminals
- ⑨ PIL 2015: additional investments to be done by existing railways concessions (**Rumo-ALL** and **VLI**)



**BNDES**

*Brazilian  
development bank*

[www.bndes.gov.br](http://www.bndes.gov.br)