



Offshore windpark Q7-WP

Mathieu Kortenoever
E-Connection Project BV



Offshore windpark Q7-WP

- 60 x Vestas V80 – 2.0 MW Offshore
- 435 GWh / year
- 130.000 Dutch households



Offshore windpark Q7-WP

- Why offshore
- Site selection
- Permits
- Tax facilities
- kWh subsidy
- Project contracts



Offshore windpark Q7-WP

Why offshore

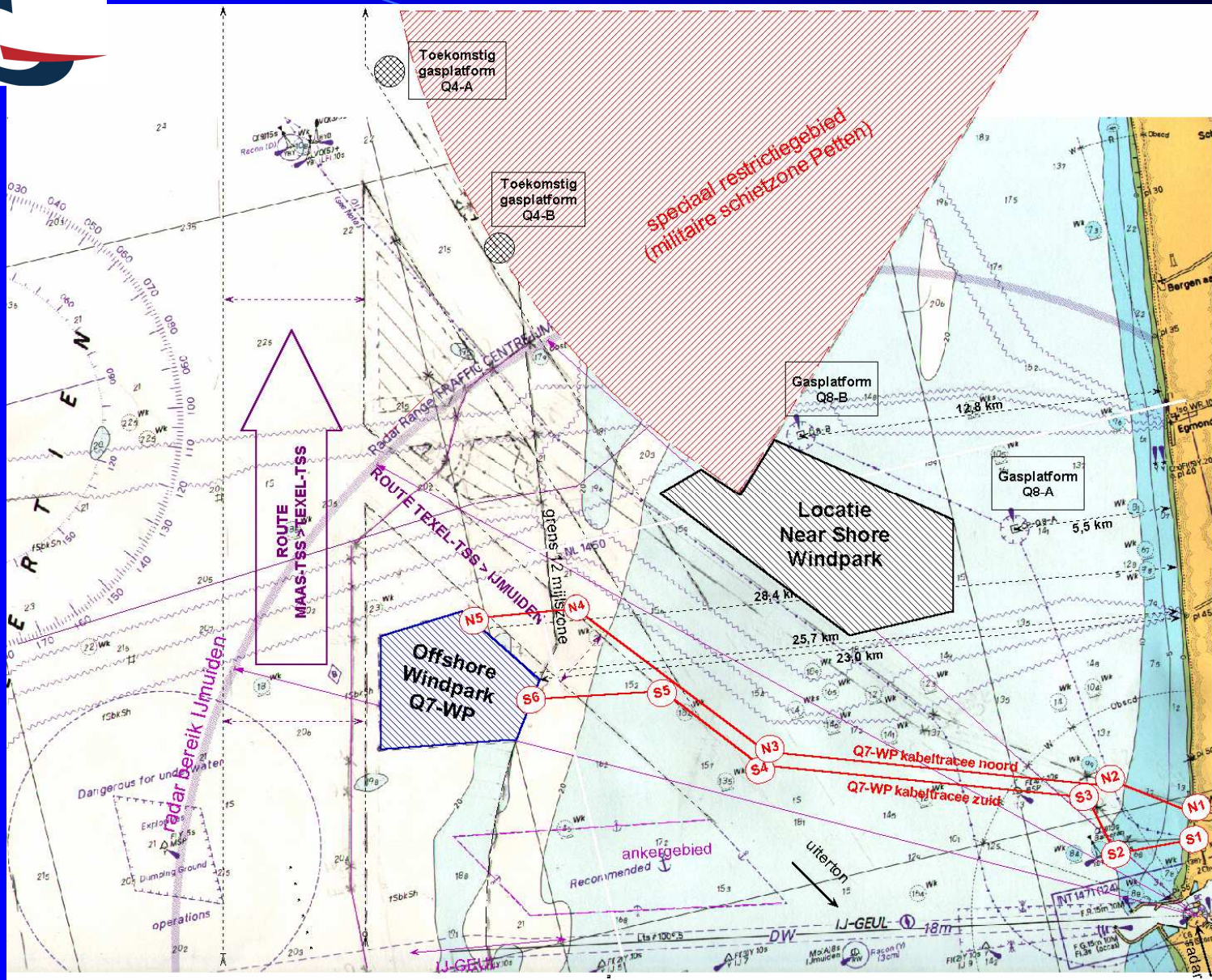
- Economies of scale
- 1997: Feasibility study NSW
- 1997: Broad awareness of offshore possibilities and offshore potential



Offshore windpark Q7-WP

Site selection

- **23 km off the coast**
- **Dutch Exclusive Economic Zone**
- **bloc Q7**
- **20 – 25 meter water depth**
- **35 km to grid**
- **14 mijl to IJmuiden harbour**





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Site selection

- **Too far to be seen from shore**
- **No interference with migrating birds**
- **Too deep for diving Eider ducks**



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Visibility from the shore:

8 km to shore..... > 75%

20 km to shore..... < 20%

30 km to shore..... < 5%



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Effect on birds

**0 – 20 km off the coast:
more birds
higher density**

divers feed up to 20 mtr. depth



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Permits offshore

Request submitted: December 1999

Starting Notice: May 2000

EIA accepted: June 2001

Publication EIA: September 2001

Permits: February 2002



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Permits onshore cable route

Requests submitted: January 2002

Permits granted: April 2002



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Grid connection at 150 kV station

Refused by Nuon: Nov. 2002

Granted by NMa-DTe: May 2003

Start of construction: Nov.2005



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Tax facilities

=> Energy investment credit

=> Rapid tax deduction

**Legal structure in place &
facilities secured: Sept. 2002**



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Tax facilities applicable offshore?

Confirmation requested: March 2001

Applicability confirmed: Dec. 2003



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Tax facilities

=> Energy investment credit

=> Rapid tax deduction

Net cash value:

Approx. Euro 145 million



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Eco tax => cancelled in June 2002

MEP => Act of July 1st, 2003

Application: Oct. 2003

Granted: May 2004

Since MEP was twice amended:

Febr. 2005 (MSK) & Febr. 2007 (Estimate)



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Total income = MEP + PPA

MEP = kWh subsidy

MEP = Euro 97 per MWh for 10 years

MEP = Euro 42 million/year



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- Permits
- Tax facilities
- kWh subsidy
- EPC contract
- Grid connection
- O&M contract
- Insurance cover



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EPC contract:

Vestas – wind turbines

A2SEA – installation of wind turbines

Smulders – mono piles

Van Oord – installation of foundation

Van Oord – cable laying



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Investors:

Eneco

Econcern

Energy Investments Holding

Principal agreement: Nov. 2004

Take over: July 2006

Financial Close: Oct. 2006



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Cable laying onshore:	Nov. 2005
Installation monopiles:	Oct. 2006
Installation turbines:	May 2007
Start of operation:	Q3 - 2007



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Start of planning: Q2 – 1998

Start of operation: Q3 – 2007

NWEA target: 6.000 MW in 2020



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