



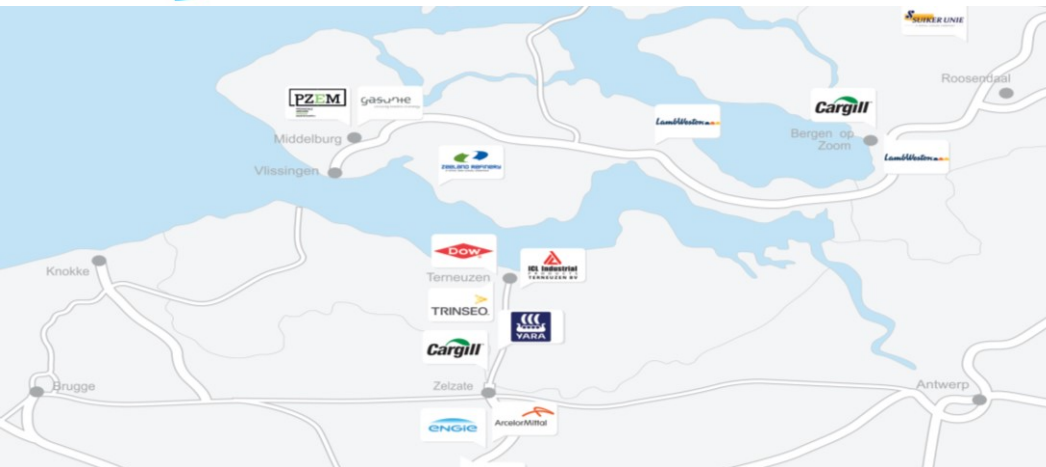
ROADMAP 2030 – 2050 REINVENT AS A CLUSTER

03rd September

AGENDA

- SDR
- Dow
- The roadmap & opportunities
- Barriers & Ask
- Q & A

SDR, SMART DELTA RESOURCES: - GRENSVEREGEND & OVERSCHRIJDEND



- 2 grootste haven zone na Rotterdam BE – NL
- Unique eco system & wereld spelers in **Staal, (Petro), Chemie en Agro**
- Unique gepositioneerd voor energy transitie – hergebruik grondstoffen -
- Grootste waterstof cluster in Benelux – 450 kt
- Potentieel voor wind energy
- Banen creaties, samenwerking universiteiten
- 20 mm CO per jaar emissies
- Maak hetzelfde beter maar zonder CO2 (windmoles, Isolatie, solar panels, handel)

Dow:

If you can't do it better, why do it?

H.H. DOW



The Dow Chemical Company

- Founded in 1897
- One of the largest material science companies in the world



DOW TERNEUZEN SITE:



Key facts & figures

DOW largest investment

Mfg, R&D and Services

12 BN \$ Investment

4 MM CO₂



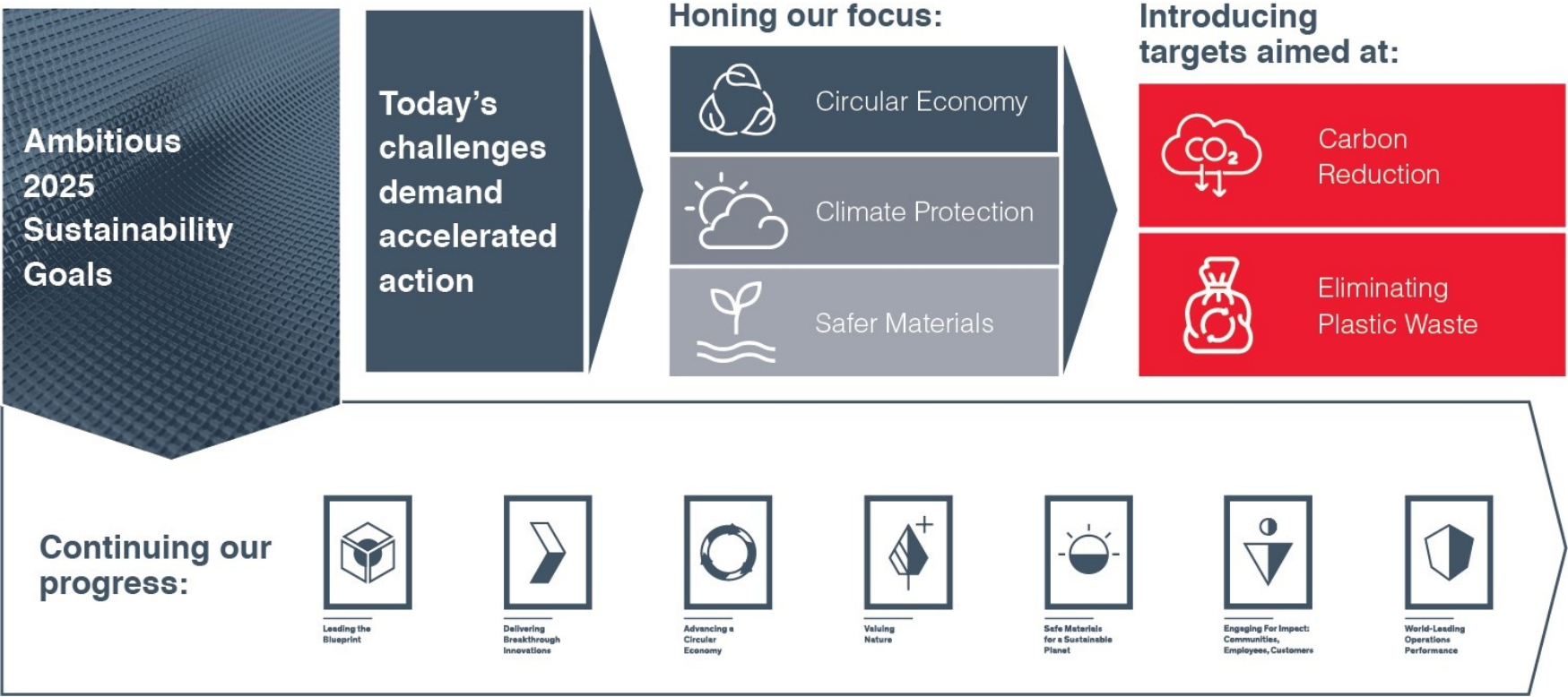
~ 4000 Employee



➤ 800 Products

80 % export

ACCELERATING OUR SUSTAINABILITY ACTIONS TO TACKLE CRITICAL CHALLENGES



CAPABILITIES IN THE REGION- SUSTAINABILITY, KEY TO OUR FUTURE

Our Focus Areas



Energy



Solar Park at Value Park

Feasibility of Solar Park closer in Value Park – Build, Operate , Marge by 3P with flexibility



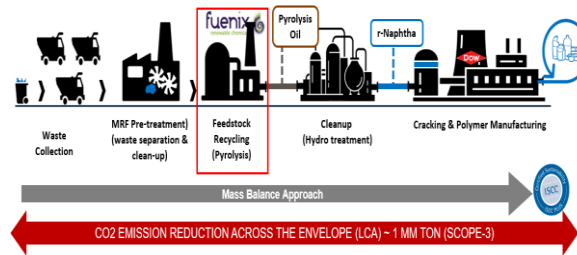
Wind Mill at Seneffe

~ 30-40% total power requirement at Seneffe Site



Alternative Feedstock

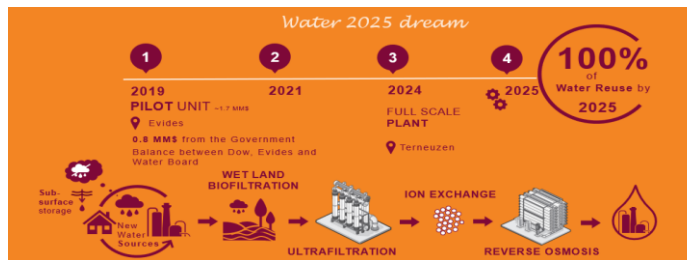
Steel2Chemicals



Bio-Naphtha



Water



Knowledge & Industrial Symbiosis



ISPT

Institute for Sustainable Process Technology



Industrial Symbiosis



STEEL TO CHEMICAL

JDA partners



ArcelorMittal

scale-up partners




PETROGAS Z ZETON
PILOT PLANT TECHNOLOGY

CLARIANT

co-funding



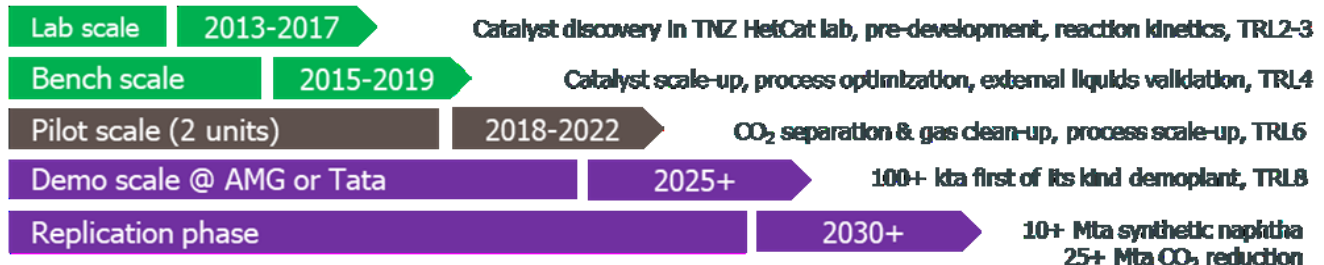

Holland Chemistry
Global Challenges, Smart Solutions

Ministerie van Economische Zaken en Klimaat

Interreg 
2 Seas Mers Zeeën



Main challenges: Technical validation with steel gas and value chain assessment



project partners










innovation for life




ROADMAP & OPPORTUNITIES: TECTONIC PROJECTS

- Electrification of Crackers
- Steel to Chemical - CCU
- Waterstof – brown, yellow, blue , green
- Circulair Feedstock recycling plastic waste



Opportunity- < CO2 + Circulair



BARRIERS & ASK:

- Challenge to big – samenwerking cluster, overheid en wetenschap !
- Netwerk voor scale – infrastructuur voor CCS, waterstof, Groene Elektra
- CCS hub is vital om 2030 doestelling te halen, schip of pipe
- Regelgeving & besluitvorming sneller
- Subsidie voor grote pilots nodig – link aan investering in regio
- Business case moet er zijn, dus onrendable top opex, capex





Seek

Together™