

## Climate-KIC Innovating for low-carbon prosperity and climate resilience



EIT Awareness Day Mary Ritter, CEO

# Climate change mitigation and adaptation



Vision:

 Providing the people, products and leadership to address the challenge of global climate change

Mission:

 Creating opportunities for innovators to address climate change and shape the world's next economy

## Climate-KIC



#### Key features

- Our twin drivers:
  - a) Commercial value
  - b) Social value
  - c) Often but not always linked
- Our markets are diverse and mostly immature or just emerging
- Climate change innovation requires systemic thinking

#### This means

- We are challenge-driven and focussed
- We need to help create and support the growth of markets
  - Climate Market Accelerator
- We provide innovative approaches to bring different players together
  - Sheltered innovation

## Our innovation community and European interconnectivity

We are a network of 165 partners across Europe (number has doubled each year: 27, 88, 165; major expansion is from business and government/public sector)

We come together at 5 Colocation centres

We reach out across Europe via the 6 regions of our Regional Innovation & Implementation Community (RIC)

Our Community is longlasting and integrated



#### Integrating four innovation sector

#### Excellence is paramount

•Our partners span world class: Universities (23%) Research institutes (10%) Business (23%) SMEs (24%); T, 47% Regional and local government (16%) Non-profit (5%)

Our knowledge triangle is a pyramid:we bring together all the actors of the innovation pyramid .....



#### **Climate-KIC Partnership**



# Europe's engine for climate change inhovation the innovation pipeline





## Output from innovation projects

	Climate-KIC Platforms						
KPIs	GHG	SCS	AS	LWEA	IS	MTH	total
# of demonstrations	3	13	3	0	0	3	22
# of services / products launched	7	8	4	2	0	7	28
# of knowledge transfer	1	0	4	6	0	1	12
# of start-ups	1	6	0	0	0	1	8
# of new employees as a result	2	2	3	2	0	3	12
# policies / standards co- developed	1	6	0	1	2	2	12
# of publications	3	23	2	6	9	5	48

## Education for Climate Innovation

- Masters (Scholars) programmes
- PhD (Fellows) programmes; challenge-driven multidisciplinary teams
- Postdoctoral researchers (Fellows)
- Associates (*The Journey* as a free-standing course for students at non-Climate-KIC universities)
- Professional programmes
- Alumni Association

### Climate-KIC Masters programme: a range of core elements



Education has delivered, since August 2010:

- 270 postgraduate students (~1:20 selected for excellence and entrepreneurial potential)
- 5 start-ups from 2010 cohort
- 28 Greenhouse from 2011 cohort
- Alumni Association; founded by 2010 cohort for students and Pioneers, now an Affiliate partner of Climate-KIC

## Supporting entrepreneurs



#### **Climate-KIC Incubation Programme**



## Entrepreneurship



Support for students, project teams, start ups and SMEs

## Incubation & Support, Business Creation, Events & Competitions e.g.

- Business coaches
- Climate-KIC Incubator network
- Climate-KIC Master Class Programme
- Climate-KIC Venture competition
- Open Innovation Slams
- SME Climate Innovation Vouchers
- Climate-KIC Market Accelerator
- Pioneers into Practice

More climate starters, more starters & SMEs on fast growth trajectory, business acceleration for innovations



Entrepreneurship – delivered since 2

- 53 ventures supported
- 16 IP projects supported
- 23 new ventures
- 167 new jobs in existing business
- 360 Pioneers-into-Practice



## **Sheltered** innovation



## Our young enterprises: Naked Energy – EIT Award 201

#### •Hybrid solar panel providing electricity and hot water

- •Combined Photo Voltaic and thermal energy system
- •PV inside the tube with water flowing though
- •PV provides electricity



•Water keeps PV at optimal temperature and provides source of hot water

Unprecedented efficiency; cheaper renewable energy



•Climate-KIC SME partner •Support from Climate-KIC UK CLC for measuring and characterising performance





## **Sheltered** innovation

- Sainsbury's
  - Reduced carbon footprint of stores
  - Carbon neutral products at low prices
  - Want innovators to work with Sainsbury's and their suppliers, e.g. farmers (sheltered innov
  - Will also offer stores as a test bed
    - e.g. Naked Energy
  - Student masters and PhD projects
- Large cascade effect via suppliers
- Model for other businesses



### Sheltered innovation: crossing the national boundary

#### Graphisoft High-Tech Park , Budapest



#### **Biopolus**

Distributed Biological Manufacturing industrial solutions with Distributed Urban Water Reuse Infrastructure solutions

**Naked Energy's** Innovative Solar Panels to supply thermal and electrical energy for the special testing and production Bioreactors





## Climate-KIC

#### A networked Community

- Long-term, stable, portfolio of partners across 4 sectors
- 11 hubs of connectivity across 10 European countries
- Innovation push connected with demand pull
- Sheltered innovation

#### The innovation pipeline

- Innovation, Entrepreneurship and Education Pillars – toolkit
- Create climate entrepreneurs
- Catalyse innovation products, services, culture
- Market identification and acceleration

#### 8 Platforms

- Focussed cross-KIC innovation communities
- Demand-side, challenge driven
- Integration of innovation, entrepreneurship and education
- E.g. Built environment; Making transitions happen

#### 5 CLC

- Focus for innovation
- Centre of knowledge
- Launch pads, landing pads

#### 6 Regions

- Market demand
- Test beds and implementation



## Thank you

