

ACTIVATING CONSUMERS TO DEEP ENERGY REFURBISHMENT IN EUROPE



**Business models and value creation as tools to design a concrete
and attractive offer**

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Development of a business model and attractive package solutions adjusted to selected target groups

Agenda

- Overview of compelling offers
- Business model and value creation
- A concrete compelling offer for DK



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Energy-
renovation
and non-
energy
benefits












Better Comfort
Healthy house
Lower energy bill
Value securing
Package solution
One-stop solution
Job creation



Refurbishment
/
maintenance
with energy
benefits

Lower CO2 discharge and climate impact
Lower use of limited energy ressources

BE	DK	NL	DE	EE	SI
					
ALL-IN-ONE AND STEP-BY-STEP RENOVATION PACKAGES	FIVE PACKAGES FOR COMFORT AND HEALTH	UNBURDENED NZEB RENOVATION	ATTRACTIVE FLATS TO LET OUT	A FAIR NZEB OFFER	AN ECONOMIC SAFE SOLUTION
Target group	Target group	Target group	Target group	Target group	Target group
 Single family houses	 Single family houses	 Any private owned house	 Multi-apartment, Housing companies and cooperatives	 Multi-apartment, private owned	 Multi-apartment, private owned
Construction period					
Any	1960-1980	Any	Any	1960-1980	Any
Specific intervention timing strategy					
Yes	Time of purchase, time of retirement	Yes	When there is a need	When owners can agree	When owners can agree
Single point of contact, independent energy adviser					
Yes	Yes	No	Non Applicable	Non Applicable	Non Applicable
Financial offer					
No	Can be integrated locally	ESCO	KfW funding options	KredEx Package	ECO Fund
 Investments in EUR 60.000+	 Investments in EUR 12.000-67.000	 Investments in EUR 20.000-100.000	 Investments in EUR No limits	 Investments in EUR 55.000-394.000	 Investments in EUR No limits
Webpage with calculation tool					
Yes	No	Non Applicable	Yes	No	No
Energy ambassadors					
Yes	Yes	Yes	No	No	No
Customer Journey consortium					
Industry with energy expert and architects	Regional/local stakeholders	Local community	District solutions	Local community	Construction company driven
Quality assurance issues addressed					
Yes	Non Applicable	Yes	Online tool	Yes	Yes

THE COMPELLING OFFER

- **BE,DK,NL: Single family homes**
12,000-100,000 EUR
- **DE, EE, SI: Multi apartment**
4,000- 8,800 EUR per apartment in a block with 45 apartments
- **Single point of contact:**
Independent adviser: BE, DK
- **Customer journey consortium**
Construction company /architects or regional stakeholders /community

Single family houses

Belgium

- My energy compass:
- Renovation Coach
- Turnkey nZEB renovation

Denmark

- Five packages: Start up, In-door climate, Energy, Comfort, Á la carte

The Netherlands

- Modular approach
- Zero Energy Bill
- Village ESCO
- Á la carte towards zero energy bill



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Multifamily houses

Estonia

- Reconstruction the heating and hot water system
- Full perimeter insulation
- PV rooftop power station

Germany

- Renovate your building stock

Slovenia

- Total renovation of multi-apartment building



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The concrete Danish compelling offer

developed by 3 Danish partners



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ENJOY LIFE MORE COMFORTABLE

Safety
Comfort
Climate
Energy
Step by step
Easy and simple



HEALTHY HOME FOR YOUR FAMILY

Well being
Room for activities
Time
Safety
Package solution
Easy and simple



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Business Model – Young families

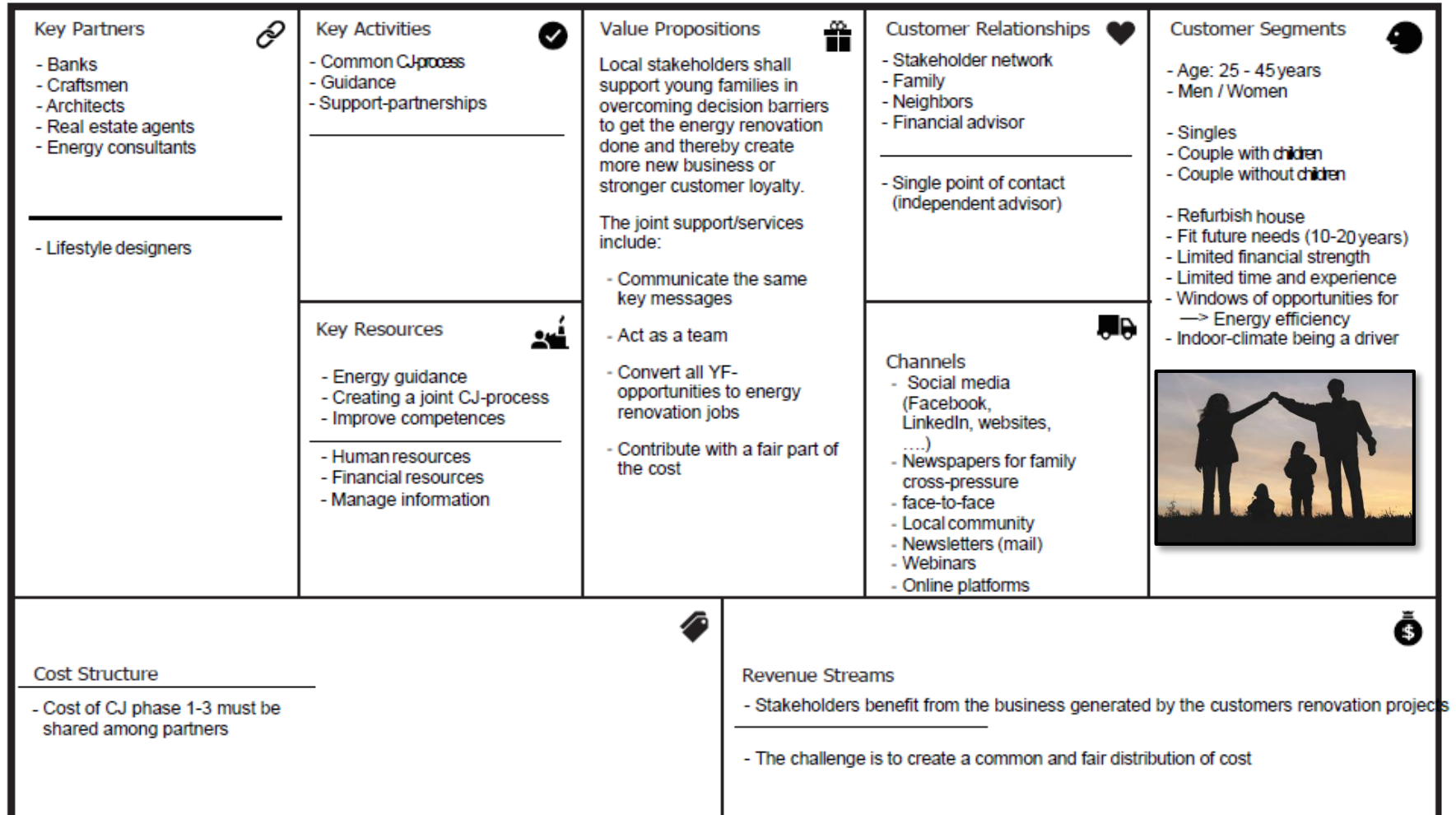
The Business Model Canvas

Designed for: Young families

Designed by: ASI/PR

Date: 2017.06

Version: 1.2



The compelling offer and benefits

START-UP

Save 15 % - Low hanging fruits

INDOOR CLIMATE

Save 30% - Better indoor climate

ENERGY

Save 70 % - Better indoor climate, healthier home and own energy

COMFORT

Save 80 % - Better indoor climate, healthier home and own energy

A LA CARTE

Save 80 % - free choice
A healthy, safe and environmentally friendly home



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CHOOSE THE OFFER THAT FITS YOU

START-UP	INDOOR CLIMATE	ENERGY	COMFORT	A LA CARTE
Target group Young families + Empty nesters	Target group Young families	Target group Empty nesters	Target group Empty nesters	Target group Young families + Empty nesters
 Investment up to € 12.000 (No central heating)	 Investment up to € 33.333 (No central heating)	 Investment up to € 56.000 (No central heating)	 Investment up to € 66.666 (No central heating)	 Investment up to no limits (No central heating)

The calculation consists of the following:

1. Theoretical energy saving calculation and initial renovation measures development
2. Technical solutions to renovate to nZEB
3. Price calculation of the technical solutions
4. Cost efficiency
5. Final development of group of measures/Steps examples



OFFERS WITHOUT DISTRICT HEATING	Get started	Indoor-climate	Save Energy	Comfort	À la carte
	 WHITE	 BRONZE	 GREEN	 GOLD	
LED light*	✓	✓	✓	✓	Free choice between all offers step by step
Pipie-insulaiton	✓	✓	✓	✓	
Circulationpump	✓	✓	✓	✓	
Radiator thermostats	✓	✓	✓	✓	
Roof insulation	✓	✓	✓	✓	
Wall insulation	✓	✓	✓	✓	
New windows**		✓	✓	✓	
Mechanical ventilation		✓	✓	✓	
Insulation of crawl space floor***		✓	✓	✓	
HP-heat + water 6 kW integrated storage			✓ 	✓	
Insulation of ground floor - standard finish****				✓	
18 m² PV				✓	
Control of heatsource				✓	

* LED light is calculated with investment and subsidy only and not energy savings

** Applies for ordinary double-layer windows

*** Exclusive new floor price

**** Low price floor

 = Improved architectural value

Energy saving in a home with energy demands of 300 kWh/m²/year	Up til 15%	Up til 30%	Up til 70%	Up til 80%
EPC before renovation	G	G	G	G
EPC after renovation	F	F	C	B
Investment in EURO	7.403	29.183	51.943	62.370
Electronics (radio, tv etc)	1.333	1.333	1.333	1.333
Whitegoods (washing machine, dryer etc.)	2.893	2.893	2.893	2.893
Total investment in EURO	11.629	33.409	56.169	66.596



Better energy label and increase in house value

Packages with no central heating	Ready to go Save 15 %	Indoor climate Save 30 %	Energy Save 70%	Comfort Save 80%
Total investment , EUR	12,000	33,000	56,000	67,000
Energy label before	G	G	G	G
Energy label after	F	F	C	B
Increase in value, EUR	+7,000	+7,000	+27,000	(+33,000)



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Refurbishment for not loosing money

Packages with no central heating	Ready to go Save 15 %	Indoor climate Save 30 %	Energy Save 70%	Comfort Save 80%
Netto Investment, EUR*	7,400	29,200	51,900	62,400
Subsidies, EUR**	1,500	2,000	3,300	3,300
Annual saving, EUR***	750	1,500	3,500	4,000
Increase in house value, EUR****	+7,000	+7,000	+27,000	(+33,000)
Surplus after year*****	<1	14	6	(6.5)

*Excl. white good and electronics

** 2 adults

***starting point Energy label G – Energy bill 5000 EUR/year

**** The Danish national Energy agency, 2015, 50.000 trading

*****Increase in house value in calculated



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Can the compelling offer be a success ?

A compelling offer on market conditions

- Communication on comfort and health with energy benefits
- Packages are easy to understand
- Consortium with regional stakeholders and building suppliers with a business case

Policy and frame conditions

- Higher energy prices
- Investment in house versus negative discount
- Energy saving needs same focus as green energy
- Energy agreement that awards homeowners with a good energy standard
- Energy saving plans for private buildings by the municipality





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Thank you for your attention

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