



Northern Research Forum

# Northern Shift of Species: Effects of Mackerel Processing in Iceland

Social, Economic and Adaptation  
Analysis of the Municipality of  
Vopnafjörður at the East Coast of  
Iceland

**CLIFFIMA-NET**

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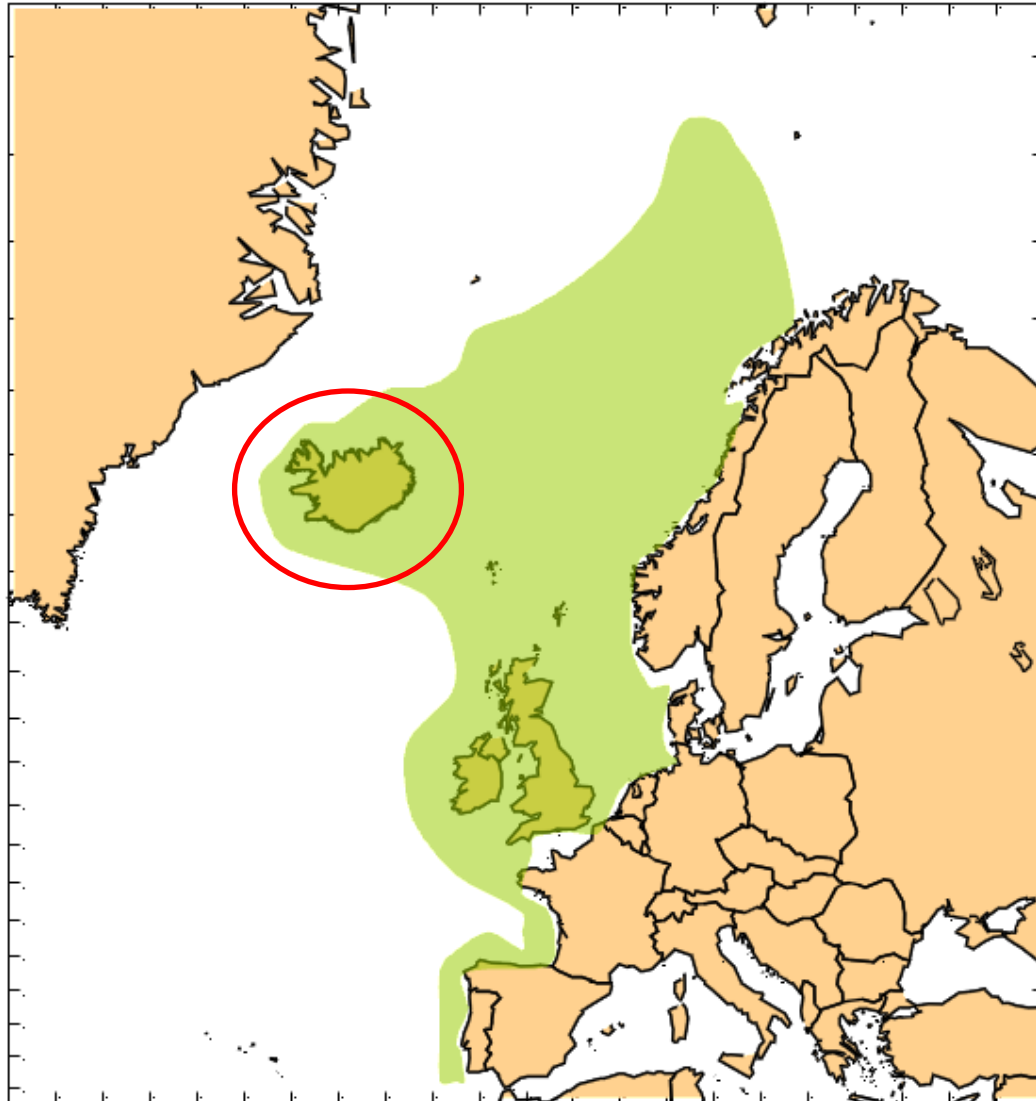


# Mackerel

- Highly migratory fast swimming pelagic species
- Has high market value
- Tends to ignore EEZs



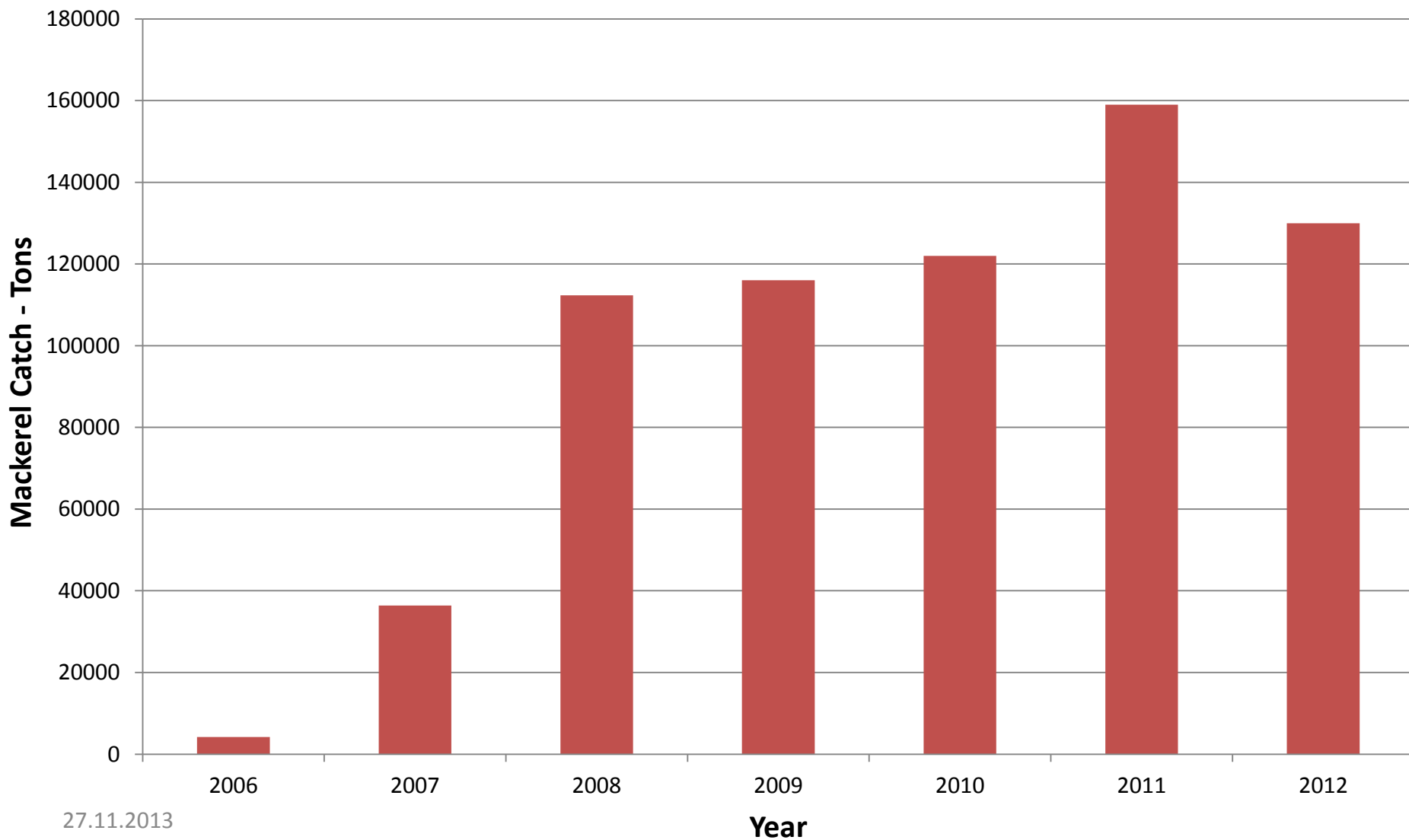
# Mackerel in Iceland



# Mackerel in Iceland

- Started as bycatch
- Catch increased significantly
- No agreements about division of quota
- Dispute is at a stalemate

# Mackerel in Iceland



# Mackerel in Iceland

- Significant gains for Icelandic Economy
- Second most valuable export species after cod in 2011
  - Accounted for 9,6% of total fisheries export
- Has had a positive effect on municipalities
- The community of Vopnafjörður is a case of a municipality that has benefitted from the fisheries



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Image from Google Maps

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Contributed by arro, Finn

# Arial view of Vopnafjörður



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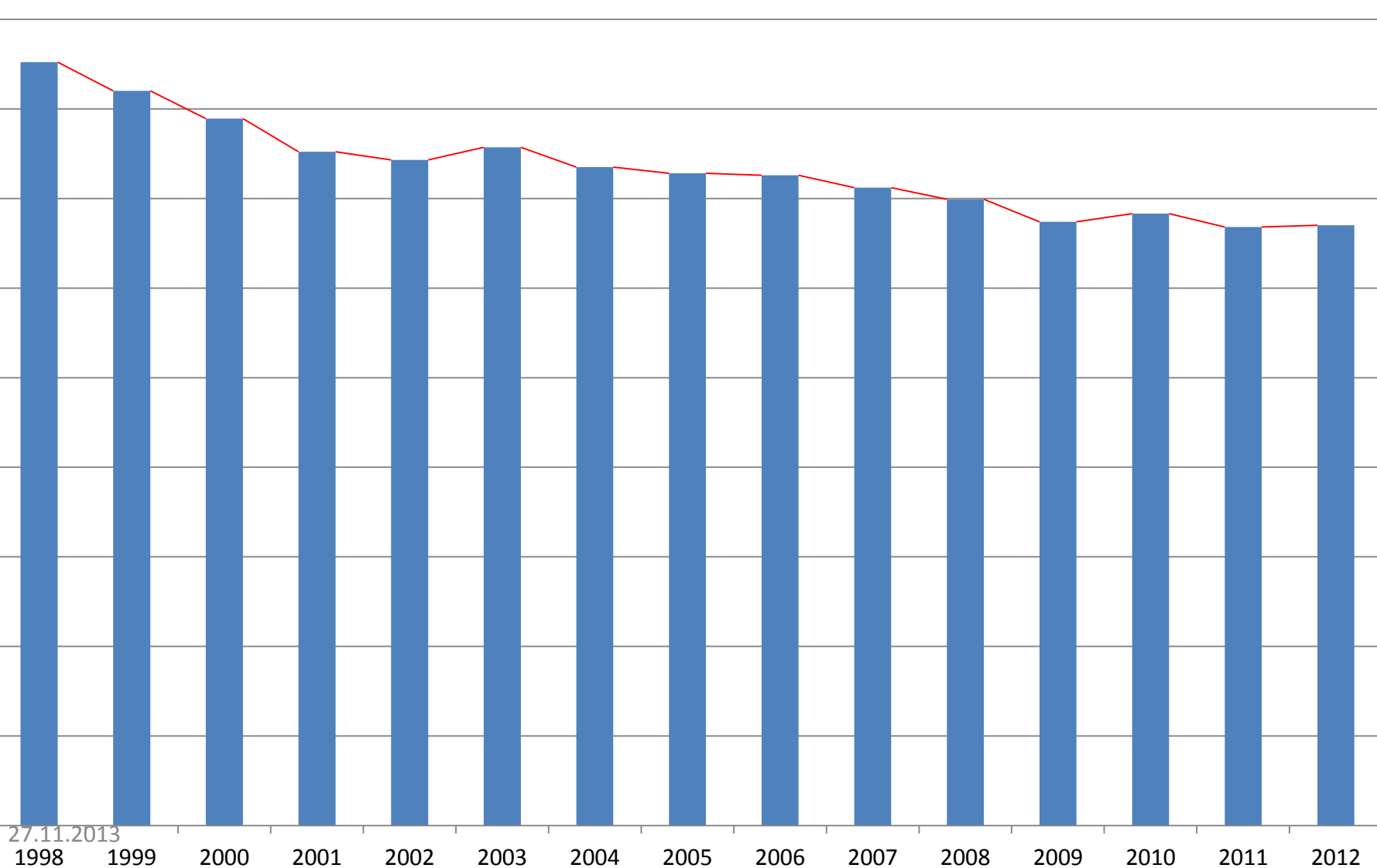
Image from Visit Iceland: <http://www.visiticeland.com/SearchResults/Town/vopnafjordur>



# About the Municipality

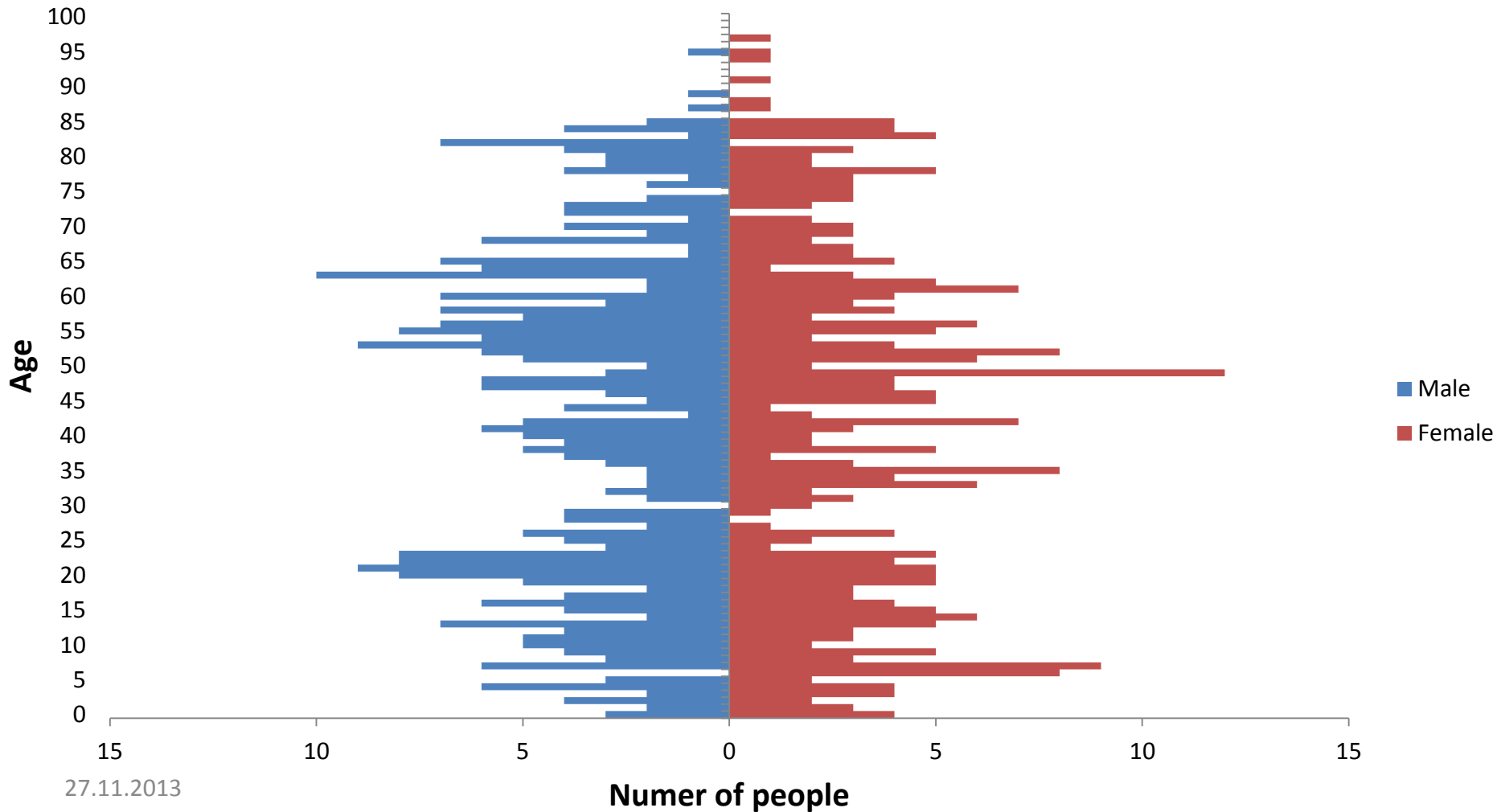
- Vopnafjörður is a small municipality on the east coast of Iceland with 670 inhabitants in 2012 (thereof 527 people in the town)
  - Large decrease in inhabitants over the decade
  - Around 20% decrease
  - Young people leave and don't come back
  - Follow similar pattern as other rural / coastal communities

# About the Municipality



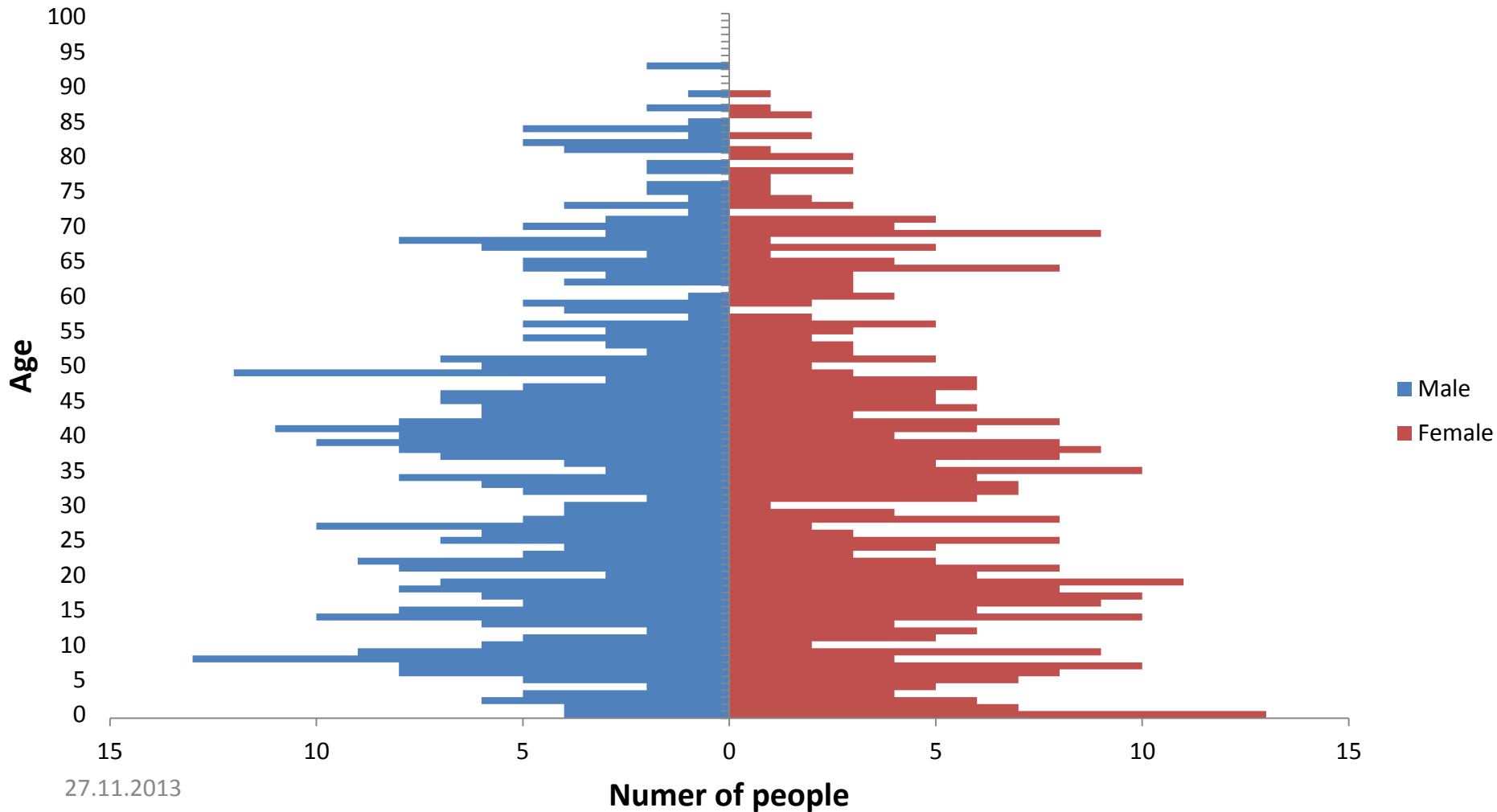
# About the Municipality

Population Pyramid of Vopnafjörður 2012



# About the Municipality

Population Pyramid of Vopnafjörður 1998



# Vopnafjörður - background

- The settlement was threatened due weak status of the processing company
- The municipality took a high risk in securing settlement by investing in the processing company
- Later they merger into the company of *HB Grandi* with a promise of increased investment
  - (one of the largest fisheries companies in Iceland)

# Vopnafjörður - background

- Heavily dependent on fisheries and fisheries processing
- After the merger into HB Grandi there has been huge investment in the pelagic sector
  - Intensive investment in Fishmeal Production
  - Intensive investment in processing

# The factory is backbone of the town



# Mackerel in Vopnafjörður

- 2004 Merger with HB Grandi
- 2006 Mackerel caught as bycatch around Iceland
- 2007 Mackerel processing for fishmeal starts in Vopnafjörður
- 2008 decision made to make intensive investment in Fish Meal production
- 2009 Increased investment in pelagic processing (freezing)
  - Experiments with processing mackerel for human consumption
- 2010 Mackerel processing for human consumption starts
- 2011 All mackerel is processed for human consumption



# Mackerel in Vopnafjörður

- Investment in the municipality by *HB Grandi* since they established in Vopnafjörður has been up to 31 million €
- Thereof 6 million € directly related to investment for mackerel processing
- Huge impact for such a small community

# Increased harbor activity



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# Mackerel in Vopnafjörður – landings and Value

	Tons	Value (ISK)	Value €
2007	1.738,3	24.123.553 kr.	149.836 €
2008	17.452,1	491.751.364 kr.	3.054.356 €
2009	13.506,1	392.698.292 kr.	2.439.120 €
2010	15.098,1	555.557.735 kr.	3.450.669 €
2011	16.458,1	1.000.451.310 kr.	6.213.983 €
2012	15.757,5	796.442.723 kr.	4.946.849 €

# Mackerel in Vopnafjörður: Effects

- Creates jobs
- 17,5% of the workforce in Vopnafjörður work at the HB Grandi processing company
- 82 jobs at a yearly base
- 26% if related jobs are also accounted (contractors etc. – around 40 positions on a yearly basis)

# Mackerel in Vopnafjörður

- During mackerel season the need for workforce increases
- Around 160 people
- Rely on outside seasonal workers
- Bad for the municipality
  - They loose income tax from that
- But still positive economic effects

# Economic effects - Municipality

Year	Income Tax	Harbour Fees
2004	957.602 €	291.174 €
2005	914.907 €	285.186 €
2006	975.876 €	234.460 €
2007	1.084.963 €	275.627 €
2008	1.096.851 €	337.230 €
2009	1.150.801 €	307.081 €
2010	1.308.484 €	414.745 €
2011	1.441.789 €	548.317 €
2012	1.601.969 €	747.267 €



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# Socio - Economic effects

- 55 persons out of 70 that answered a survey about the mackerel processing in Vopnafjörður
- 48 said that they experienced positive economic change from mackerel
  - Majority experienced very positive change
- The wealth is noticeable in the community



# Social effects

- Increasing economic activity has led to less social activity
  - Resembles more of a labor camp during seasonal work, especially during mackerel season
  - Social innovation has decreased
  - Economic innovation has decreased
  - Hard for other companies to compete for labor

# Social effects

- The town splits in two parts
  - Those that feel strong empathy towards HB Grandi (People related to the company)
  - Those who criticize the company (people with little or no relation to the company)
  - There is jealousy towards the workers due to high earnings

# Social effects

- There is however a general positive perception towards the company in the community
- People appreciate what *HB Grandi* has done
- There is also a strong demands towards the company
- Some fear the power of the company in the community

# Social effects

- Everyone that answered the survey said that HB Grandi was important or very important for the community (staff survey)
- Extremely positive feedback from the processing company

# Future perceptions

- People are reassured that the company is there to stay
- Do not seem fear natural changes
  - Such as climate change
  - Even seen as positive
- Anthropogenic changes are of more concern
  - EU membership is of the greatest concern

# Conclusion - Vopnafjörður

- The municipality showed a great deal of adaptability in securing processing in the municipality
- The municipality is no longer in charge of the processing; they are reliant on outside management which might affect the resilience of the community
- They are vulnerable to changes in the fisheries sector since they do not have control, especially if they do not manage to diversify their economy

# Conclusion – HB Grandi

- HB Grandi has shown even more adaptability capacity
- Reactive adaptation
  - No plan is existing – they just react to change when it happens
  - Do not consider climate change as a threat

# Overall conclusion

- Positive economic effects
  - Creates jobs
  - Increases revenue
- Secures settlement
  - Out migration stops
- Less positive social effect
  - Are in a kind of transition mode



# Thank you



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# Special thanks to:

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HÁSKÓLANS Á AKUREYRI



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