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# Languages & Language Technologies in Finland

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## Isn't Finland monolingual?




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- Finland has two official languages (Finnish and Swedish)
- In real life, many more are used daily:
  - Immigration
  - Tourism
  - Trade and commerce
  - Regional development, governance, and cooperation
    - Mobility and traffic
    - Energy and climate change
    - Environment and natural resources
  - Cross-border legal issues (e.g. marriage, birth, contracts)


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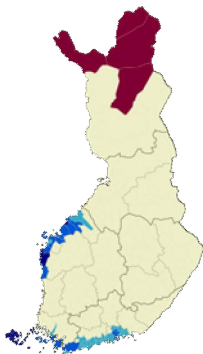


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## Language Regions in Finland




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- Municipalities of Finland:
- – unilingually Finnish
- – bilingual with Finnish as majority language, Swedish as minority language
- – bilingual with Swedish as majority language, Finnish as minority language
- – unilingually Swedish
- – bilingual with Finnish as majority language, Sami as minority language


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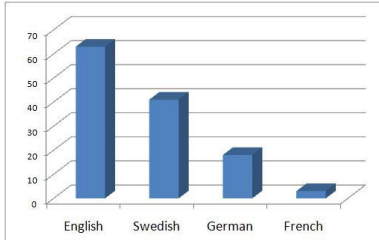
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## Languages in Finland

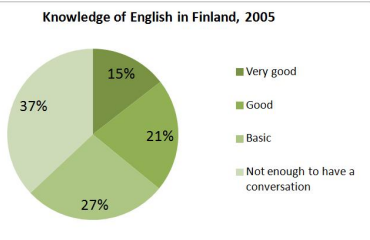


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- Finnish is the first language in the EU of ~5 million speakers (and Swedish that of ~9 million of whom ~291k in Finland)
- Most Finns understand at least three languages (English, German, French and recently Spanish are the most common in addition to Swedish or Finnish)




Language	Number of Speakers
English	~65
Swedish	~45
German	~25
French	~10



Level of Knowledge	Percentage
Very good	15%
Good	21%
Basic	27%
Not enough to have a conversation	37%


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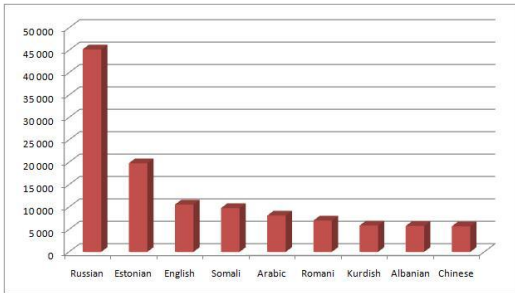
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## Minority Languages in Finland



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- Recognized minority languages:
  - three variants of [Saami](#)
  - [Romani](#)
  - [Finnish Sign Language](#) and
  - [Karelian](#)
- Speakers of unofficial languages (2007):
  - Russian ~45k
  - Estonian ~20k
  - English ~10k
  - Somali ~8k
  - ...



Language	Speakers (Approx.)
Russian	45,000
Estonian	20,000
English	10,000
Somali	8,000
Arabic	7,000
Romani	6,000
Kurdish	5,000
Albanian	4,000
Chinese	3,000

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## Languages of our Neighbours




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## Regional multilingualism




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- Cross-border collaboration
  - Ambulances/emergency services
  - Legal requirements
  - Law enforcement
  - Infrastructure projects
    - Roads
    - Rails
    - Postal services
  - Financial infrastructures

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## Regional multilingualism




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- Sustainable energy  
(Sweden, Finland, Norway, Russia, Germany, Estonia)
  - Gas pipelines, Nuclear power, Water power
  - Implementation of technical solutions and business cases
- Regional sustainable waste-to-energy production  
(Sweden, Finland, Poland, Lithuania, Estonia, Russia)
  - Around the Gulf of Finland and the Baltic Sea
  - Focus on reduction of carbon dioxide emissions
  - Utilisation of waste from cities, farming and industry for energy purposes

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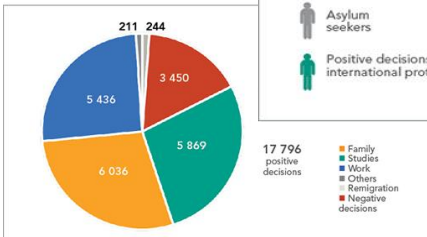
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## Immigration



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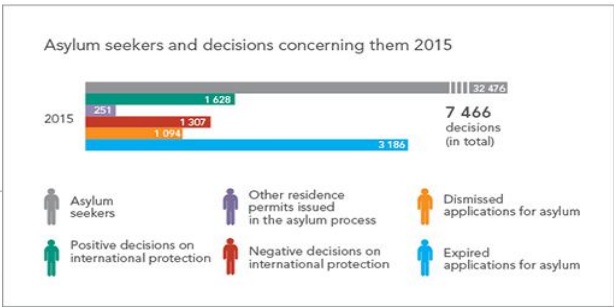
- In 2015, Finland became a popular destination for asylum seekers



17 796 positive decisions

- Family
- Studies
- Work
- Others
- Reintegration
- Negative decisions

Asylum seekers and decisions concerning them 2015




2015: 251 (Asylum seekers), 1 628 (Other residence permits issued), 1 307 (Dismissed applications), 1 094 (Positive decisions), 3 186 (Negative decisions), 32 476 (Total decisions)

7 466 decisions (in total)

as well as for other reasons of immigration


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## Top 10 sources of immigration to Finland in 2015



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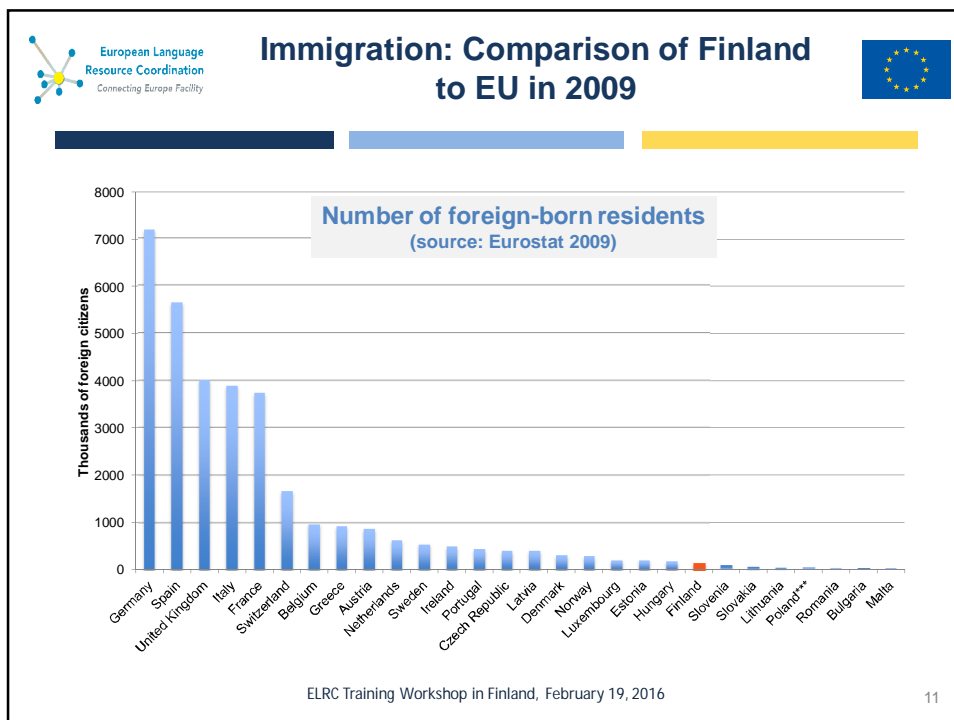
Country	Numbers
Total	32 476
Iraq	20 484
Afghanistan	5 214
Somalia	1 981
Syrian Arab Republic	877
Albania	762
Iran, Islamic Republic of	619
Russian Federation	190
Kosovo	167
Other	2 182

**Foreign citizens living in Finland:**

- Total ~231 000
- Estonians ~50 500
- Russians ~31 100
- Swedes ~8 300
- Chinese ~8 100
- Somalis ~7 500
- Thai ~7 400
- Iraqis ~7 100

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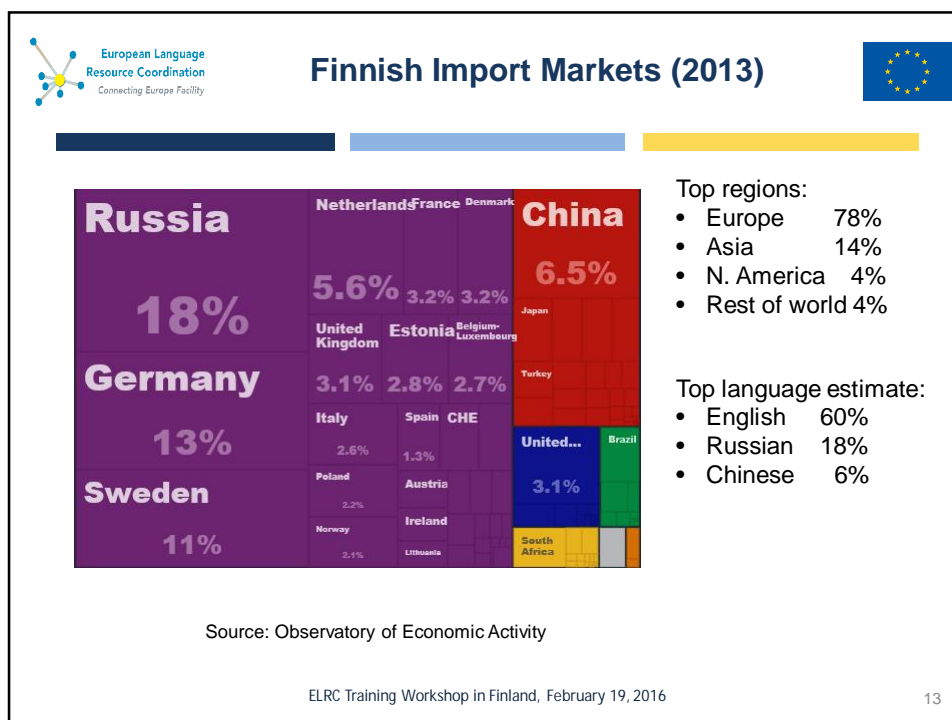
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## Language Resource Infrastructure in Finland

- **FIN-CLARIN**  
– CLARIN Common Language Resources and Technology Infrastructure Consortium in Finland
- **Kielipankki**  
– The Language Bank of Finland
- **Tieteen termipankki**  
– The Bank of Finnish Terminology in Arts and Sciences

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## Language Technology in Finland




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- Helsinki University
  - Text-based technology / HFST
  - Machine Translation
  - Speech synthesis
- Aalto University
  - Speech-based technology
- Turku University
  - Information technology
- Metropolia
  - Text-based applications
- ...






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## Language Industry in Finland




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