USE OF THE POTENTIAL OF RENEWABLE ENERGY SOURCES IN LITHUANIA

Performance audit
(finished in 2010)

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National Audit Office of Lithuania
April 2015, Tallinn
Goals of the use of renewable energy sources

- ENERGY SECURITY
- ENERGY INDEPENDENCE
- ENVIRONMENTAL ISSUES

- DIVERSITY AND RELIABILITY OF ENERGY SOURCES
- NOT THE ONLY SOURCE OF ENERGY
- EMISSION REDUCTION
International commitments

- 20% Reduction of final energy consumption
- 20% Reduction of CO₂ emissions
- 20% Cogeneration of energy from renewable sources
EU mandatory target

8% SHARE OF ENERGY FROM RENEWABLE SOURCES IN GROSS FINAL ENERGY CONSUMPTION

2005 2020
AUDIT OBJECTIVE

TO EXAMINE AND EVALUATE THE STATE INPUT INTO THE USE OF POTENTIAL OF RENEWABLE ENERGY SOURCES

AUDIT CRITERIA

• A reserve-to-use ratio
• Compatibility of RES development with the energy security of the state
• Compliance of energy from renewable sources with green energy
• Complexity of the use of RES
WE COLLECTED INFORMATION FROM

KAUNAS UNIVERSITY OF TECHNOLOGY

MINISTRIES OF ENVIRONMENT, ENERGY AND ECONOMY

LITHUANIAN ENERGY INSTITUTE

LITHUANIAN GEOLOGICAL SURVEY

ASOCIATIONS OF RES AND PRODUCERS

LITHUANIAN BUSINESS SUPPORT AGENCY
LITHUANIA HAS ENOUGH RENEWABLE ENERGY RESERVES
THE NATIONAL ENERGY STRATEGY HAS NOT BEEN UPDATED
AUDIT FINDINGS

LACK INTEGRATED DEVELOPMENT OF ENERGY FROM RENEWABLE SOURCES
NOT EVERYTHING IS GREEN WHICH IS SUPPOSED TO BE GREEN

THE TARGET SHOULD BE TO DEVELOP THE PRODUCTION OF GREEN ENERGY
AUDIT FINDINGS

THERE IS NO BALANCED AND STABLE SYSTEM FOR PROMOTING THE DEVELOPMENT OF ENERGY FROM RENEWABLE SOURCES
AUDIT FINDINGS

RESEARCH OPPORTUNITIES OF THE COUNTRY ARE NOT USED

Scientists can help set strategic targets, mobilise research capacities, plan applied research and experimental development work.
CHANGES AFTER THE AUDIT

REVISION OF THE LEGAL BASIS

- Development of the National Energy Independence Strategy
- Approval of the Renewable Energy Development Programme
- Revision of the provisions of the Law on Energy from Renewable Sources
- Adoption of new regulations or revision of the existing ones
VISIBLE CHANGES

CHANGES AFTER THE AUDIT

- High probability of meeting the international commitments
- Benefit for the population
- Reduced pollution
- Commencement of the production of facilities for renewable energy sources
## General information

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<tbody>
<tr>
<td><strong>1. PLANNED SHARE OF RENEWABLE ENERGY SOURCES IN THE ELECTRICITY SECTOR (%)</strong></td>
<td>11</td>
<td>14</td>
<td>15</td>
<td>20</td>
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<tr>
<td><strong>2. PLANNED SHARE OF RENEWABLE ENERGY SOURCES IN THE HEATING AND COOLING SECTOR (%)</strong></td>
<td>35</td>
<td>40</td>
<td>43</td>
<td>45</td>
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**THE SHARE OF RENEWABLE ENERGY SOURCES IN INDIVIDUAL SECTORS PROJECTED FOR THE ATTAINMENT OF THE TARGET:**

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<tr>
<td><strong>2.1. PLANNED SHARE OF RENEWABLE ENERGY SOURCES IN THE DISTRICT HEATING SECTOR (%)</strong></td>
<td>28</td>
<td>50</td>
<td>60</td>
<td>70</td>
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<tr>
<td><strong>2.2. PLANNED SHARE OF RENEWABLE ENERGY SOURCES IN THE SECTOR OF INDIVIDUALLY HEATED HOUSES (%)</strong></td>
<td>68</td>
<td>71</td>
<td>72</td>
<td>74</td>
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<tr>
<td><strong>2.3. PROJECTED SHARE OF RENEWABLE ENERGY SOURCES IN THE SECTOR OF INDIVIDUALLY HEATED NON-HOUSEHOLD CONSUMERS (%)</strong></td>
<td>14</td>
<td>14</td>
<td>13</td>
<td>13</td>
</tr>
<tr>
<td><strong>3. PLANNED SHARE OF RENEWABLE ENERGY SOURCES IN THE TRANSPORT SECTOR (%)</strong></td>
<td>4,8</td>
<td>5,1</td>
<td>5,3</td>
<td>5,5</td>
</tr>
<tr>
<td><strong>4. PROJECTED SHARE OF RENEWABLE ENERGY SOURCES COMPARED TO GROSS FINAL ENERGY CONSUMPTION (%)</strong></td>
<td>22</td>
<td>25</td>
<td>26</td>
<td>29</td>
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</table>
REMARKS AND SUGGESTIONS

• The potential of renewable energy sources in Lithuania is higher than it is actually used.
• Since the audit covered the potential of the use of all RES in Lithuania, the only thing that could be audited in future is the development of individual RES.
• The issue of renewable energy sources is equally relevant today as it was in 2010.