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ECONOMIC COMMISSION FOR EUROPE

EXECUTIVE BODY FOR THE CONVENTION ON LONG-RANGE TRANSBOUNDARY AIR POLLUTION

Working Group on Strategies and Review

REACTIVE NITROGEN

Report by the Co-Chairs of the Task Force on Reactive Nitrogen

I. Introductory remarks

1. This report, prepared in cooperation with the secretariat to the Convention on Long-range Transboundary Air Pollution, describes the results of the seventh meeting of the Task Force on Reactive Nitrogen, in St Petersburg, Russian Federation, on the 28th February to 2nd March 2012. The background documents and presentations made during the meeting and the reports presented can be accessed at: www.clrtap-tfrn.org. Reports on the recent work conducted through the expert panels of the Task Force are also detailed here: the Expert Panel on Mitigation of Agricultural Nitrogen, the Expert Panel on Nitrogen Budgets, the Expert Panel on Nitrogen and Food and Expert Panel on Nitrogen and Climate. The report also summarizes the activities and outcomes of the workshop on 'Abating ammonia emissions in EECCA and other countries of the UNECE regions', and the workshop of the Network of Environmental Benefits and Economic Instruments (NEBEI).

A. Attendance

2. The overall meeting was attended by 67 participants from 16 countries, including those joining the parallel meeting of NEBEI. Also present were representatives from the Working Group on Strategies and Review, the Task Force on Integrated Assessment Modelling, the EMEP[1] Centre for Integrated Assessment Modelling (CIAM) at the International Institute for Applied Systems Analysis (IIASA); and the Helsinki Commission on protection of the Baltic Sea.

B. Organisation of work

3. The Task Force was co-chaired by Mr. O. Oenema (Netherlands) and Mr. M. Sutton (United Kingdom). It was hosted by the Russian Federation, with support from the UK Department for Environment Food and Rural Affairs, the Netherlands Environmental protection institute (RIVM), the Ministry of Economic Affairs, Agriculture and Innovation of the Netherlands, and the North-West Research Institute of Agricultural Engineering and Electrification (SZNIIMESH) of the Russian Academy of Agricultural Sciences.

[1] The Cooperative Programme for Monitoring and Evaluation of the Long-range Transmission of Air Pollutants in Europe.

4. The meeting was opened by Mr. V. Popov (Russian Federation), director of SZNIIMESH, who highlighted the continuing challenges to abate ammonia in the Russian Federation and commented that meetings such as TFRN-7, with specifically designed inclusion of EECCA countries, were very beneficial for mutual understanding. A representative of the Ministry for the Environment of the Russian Federation, Mr. S. Vasiliev, welcomed the participants, pointing out that the information shared between the EECCA countries and the rest of the UNECE during this meeting would help us all to work towards harmonization of policy across the UNECE community.

5. The TFRN meeting was held in Plenary (and simultaneously translated between English and Russian), and involved discussing the work of the expert panels and the outcome of two preceding workshops. Other topics discussed were perspectives from the nitrogen water pollution community, and the potential links between nitrogen mitigation and development of a 'Green Economy'.

II. Activities related to the Gothenburg Protocol

6. The United Kingdom co-chair (Mr. Sutton) updated the Task Force on the information presented to the 49th Meeting of the Working Group on Strategies and Review, in September of 2011, as detailed in the co-chairs report [ECE/EB.AIR/WG.5/2011/16].

7. An updated version of the ammonia guidance document was submitted to the 49th Session of WGSR [Informal Document No. 21]. It was agreed that a new version of this document will be submitted to the 30th Session of the Executive Body in April, after incorporating comments from members of the WGSR and the Expert Panel on Mitigating Nitrogen.

8. Mr Sutton summarized the findings of the report 'Ammonia reductions and costs implied by the three ambition levels proposed in the Draft Annex IX to the Gothenburg protocol', which had been presented to the 30th Session of the Executive Body [Informal Document No.5]. This report contained projected costs for abating ammonia emissions to 2020, under the three ambition levels outlined in the draft Annex IX by the Task Force on Reactive Nitrogen, plus a cost optimised scenario. All calculations were made using the updated GAINS model. Participants were asked to consider the report, in particular the costs reported for their countries, and to discuss them with their expert colleagues, National Focal Points and relevant ministers. It was emphasized that the costs for ammonia abatement according to the three scenarios were much smaller than previous estimates, representing additional costs of between 200-1000 million Euro across the whole of the UNECE region, depending on the ambition level.

A. Annex IX

9. It was noted that an official document [ECE/EB.AIR/2012/11] had been submitted by the European Commission to the 30th meeting of the Executive Body of the Convention as a proposal for amending Annex IX. As the document contains technical information which is not completely correct, the Task Force agreed that the co-chairs would send a response on these technical points to the European Commission.

B. Guidance Document on Ammonia Abatement

10. The finalisation of the Guidance Document on Ammonia Abatement was the main focus of the meeting of the Expert Panel on the Mitigation of Agricultural Nitrogen held in St Petersburg on the 27th February. The group of 45 experts worked on the document in three parallel groups, each focussing on different sections of the Guidance Document. The outcomes of the discussions are to be

included in a new draft. The revised document will be submitted for translation into both French and Russian, for submission to the 30th meeting of the Executive Body as an informal document.

11. The Task Force took note of a recent paper published in the journal Biogeosciences which suggests the need to revise the magnitude of ammonia emission factors from slurry spreading (Sintermann et al., 2011, 'Are ammonia emissions from field-applied slurry substantially over-estimated in European emission inventories?)'. The Expert Panel on Mitigating Agricultural Nitrogen, noted the potential implications for inventory work, mitigation calculations and developing nitrogen budgets. However, the group concluded that further information should be obtained on the datasets used and that mechanistic models of ammonia loss could also be used to further inform the work, before any updates to emission factors should be made. Ongoing work in Switzerland will also be available in the future, to inform the discussion.

C. Framework Code of Good Agricultural Practice

12. The Expert Panel on Mitigating Agricultural Nitrogen discussed the updating of the Framework Code of Good Agricultural Practice. A questionnaire on the Framework Code was circulated and returned to the co-chairs of the panel, along with several offers of support in the further development of the document. It was stressed by Mr. M. Dedina, the Czech Republic co-chair of the Expert Panel, that it is a very useful document for countries and well worth reading, not just by farmers but all those involved in work relating to the Gothenburg Protocol and Annex IX.

II. Workshop 'Abating ammonia emissions in the EECCA region and other countries of the UNECE in the context of the nitrogen cycle'

13. The workshop was held on the 29th February (with simultaneous translation in Russian and English). There were 47 participants from 16 countries and the programme including many country case studies, as well as presentations from several EECCA participants. A workshop resolution was presented and agreed by the Task Force, this included the agreement of the Task Force to establish an Expert Panel on Nitrogen in EECCA countries. The agreed resolution (Annex A) is included here for information to the Working Group on Strategies and Review and the EECCA Co-ordinating Group.

14. The purpose of the proposed new panel on 'Nitrogen in EECCA countries' would be to: a) recognise the unique systems and nitrogen management in these countries, and b) to promote cooperation among EECCA countries and across the UNECE region, including cooperation with the other expert panels of the Task Force. It is anticipated that the expert panel will provide an opportunity for greater working and sharing in this area, leading to greater involvement of EECCA countries and views in the Task Force as a whole, building on the links and success of the meetings surrounding TFRN-7.

III. Nitrogen Budgets

15. The co-chair of the Expert Panel on Nitrogen and Budgets (Mr. W. Winiwarter) provided a report on the work of the panel since the last Task Force meeting and discussed the agenda for their meeting which immediately followed the Task Force (2nd March 2012). He reported progress in several areas including the Guidance Document on Nitrogen Budgets which was submitted to the 49th meeting of WGSR [Informal Document No. 20]. The Expert Panel on Nitrogen and Budgets would discuss any further amendments to be made to this document at their following meeting, and would prepare the

updated document for the 30th Session of the Executive Body in April, to support their discussions on the updating of the Gothenburg Protocol.

16. A workshop on a 'Dynamic Tool for Nitrogen Budgets' was held in Switzerland, in August 2011. The current version of the tool is set up for Switzerland. Following further development, the panel expressed its wishes to support other countries use the tool for their national situations.

17. The expert panel has been forging links with other international bodies such as the Organization of Economic Cooperation and Development (OECD) and EUROSTAT, including discussions on the use of nitrogen as a high-level environmental indicator. To further this work, the panel has been exploring the possibility of a 'Memorandum of Understanding' between EUROSTAT and the UNECE. The Task Force agreed that this was a good way to encourage future collaboration.

18. National level budgets, such as that being developed for Austria, were also discussed at the following meeting of the Expert Panel, together with the development of farm level budgets. It was proposed that a workshop in autumn 2012 may be organised to further this work. The Expert Panel on Nitrogen Budgets would welcome experts on farm budgets to approach the panel regarding this work.

IV. Food Consumption and nitrogen pollution

19. On behalf of the Expert Panel on Nitrogen and Food, Ms. A. De Marco presented the draft summary of the report 'Nitrogen on the table: The influence of food choices on nitrogen emissions and the European environment'. The report makes the links between dietary choices and nitrogen cycle pollution, including the links between ammonia emissions and emissions of other nitrogen forms, such as nitrates and the greenhouse gas nitrous oxide. The analysis had been conducted by first developing footprints according to different food commodities, and then examining the potential impact of six scenarios of dietary choices on pollution levels for two land-use scenarios in each case. As this is the first attempt of such an analysis, the group has restricted their work to the EU-27 area.

20. It was agreed that the full report will be published as a 'Special Report' of the European Nitrogen Assesment' later this year. Nitrogen footprints of all countries in EU-27 were presented to the meeting and it was noted that in some countries current protein consumption per capita is double the protein requirements according to standards established by the World Health Organization (WHO). Beef production was shown to be more polluting than pig and poultry production. Switching to a diet with a 50% reduction in all animal products (including meat and dairy, to be replaced by plant products) had the greatest benefits of the scenarios considered in reducing nitrogen pollution, reducing ammonia emissions by 43%, and nitrate leaching by 35%. Based on the WHO recommendations, including those for saturated fats, it can be considered that there are also significant co-benefits for human health in avoiding over-consumption of animal products, as illustrated by the scenarios.

21. The Task Force agreed to take comments on the draft summary up to 12th March. It was also agreed that it would be useful in future work to widen such a study to the EECCA countries, if resources permitted.

V. Nitrogen and Climate

22. The Co-chair of the Task Force from the United Kingdom provided a summary and update on the work of the Expert Panel on Nitrogen and Climate. An initial report [Informal Document No.9] was submitted to the Executive Body of the Convention in December 2010, following on from this, a workshop on 'Nitrogen and Climate: Interactions of reactive nitrogen with climate change and

opportunities for integrated management strategies' was held in Amsterdam in late October 2011, in collaboration with the Working Group II of the Intergovernmental Panel on Climate Change (IPCC). The report from this meeting can be found on the Task Force website, and highlights opportunities for the IPCC Fifth Assessment Report to consider the role of nitrogen in climate change.

VI. NEBEI Workshop

23. The chair of the Network of Environmental Benefits and Economic Instruments (NEBEI), Mr M. Holland (United Kingdom), reported on a workshop 'Further quantification of the effects of air pollutants on ecosystems' held on the 29th February in St Petersburg, adjoining the seventh meeting of the Task Force on Reactive Nitrogen. There were 17 participants to the workshop, from ten countries and the workshop greatly benefitted from simultaneous translation between Russian and English. The role of NEBEI in the Convention was outlined, including a discussion of the use of economic instruments, such as subsidies, taxes and investment. The group has already produced a Guidance Document and it was noted that it would be very useful if this were translated into Russian.

24. Cost-benefit analysis was also discussed during the workshop, in the context of three case studies, including one in relation to the Gothenburg Protocol. New developments in methods were discussed, and it was noted from one case study that sensitivity to pollution can be seen to vary by country. Overall it was also agreed that there is an important need to think carefully about how the outcomes of such studies are communicated to policymakers, balancing the correct depth of information against readability. A full description of the meeting will be reported by NEBEI.

VII. European Nitrogen Assessment

25. The co-chair from the United Kingdom (Mr Sutton) updated the Task Force on recent activities regarding the European Nitrogen Assessment which was launched in April 2011. He highlighted a large number of invited dissemination presentations of the Assessment, including at conferences organized by Fertilizers Europe, the European Commission, and the International Federation of Organic Agricultural Markets (IFOAM). He outlined the approach whereby future Special Reports of the ENA may be published through the Task Force, as a means to simplifying public communication, where a) the report had been peer reviewed and b) there was a case for a public launch of the report in question. In this regard, the Task Force agreed that the forthcoming report of the EPNF, 'Nitrogen on the table: The influence of food choices on nitrogen emissions and the European environment' would be published as such a 'Special Report' of the European Nitrogen Assessment.

26. The co-chair reported an update on the work of the Global Partnership on Nutrient Management (GPNM) established under the lead of the United Nations Environment Programme (UNEP), which was preparing an overview on nutrient management with a global perspective, to complement other regional nitrogen assessments which are currently under development. The developing overview had been presented through the GPNM to the Third Intergovernmental Review (IGR-3) of the Global Program for Action for the Protection of the Marine Environment from Land- based Sources (GPA). This may in due course provide the foundation for establishing a global nitrogen or nutrient assessment to which the Task Force on Reactive Nitrogen would contribute. The co-chair highlighted that this was an important opportunity to further link the assessment of nitrogen and transboundary air pollution with the marine and land pollution communities, therefore further developing a more integrated approach to nitrogen management.

VIII. Experience from other international conventions and processes

27. A representative of the Helsinki Commission (HELCOM), Mr. M. Durkin, presented an overview of nitrogen pollution issues and the Baltic Sea, the work of HELCOM and the Baltic Sea Action Plan (BSAP). The BSAP looks towards improvements by the year 2020, through a number of measures (with interim nutrient reduction targets set for 2016). Regarding eutrophication, targets set were defined by calculating maximum allowable inputs to the Baltic and then converting this to the required reduction from the sources. It was also noted that 25% of the nitrogen inputs into the Baltic are from airborne pollution. To tackle this, HELCOM is working on several fronts, including addressing inputs from shipping and is keen to liaise closely with both the LRTAP Convention and the European Commission. Regarding agriculture, there is an annex to the Helsinki Convention which tackles emissions from agriculture; projects which currently support this work include 'Balthazar, which involves developing risk assessments of large agricultural systems in Russia. However there is still some way to go in mitigating agricultural emissions.

28. A representative of 'Apele Romaine' the Romanian Water Ministry, Mr. G. Dragoi, spoke about the Water Framework Directive and how this is being implemented in Romania, through the Nitrate Directive (1991). In Romania around 55% of the country has been designated as a 'Nitrate Vulnerable Zone'. Many measures in agriculture which are beneficial to nitrate leaching reduction, are also be beneficial to ammonia reduction and there is an opportunity for gains in this area if the communities can link up and discuss the synergies.

29. A presentation was given by Mr. S. Kondratyev (Russian Federation), on the difficulties of modelling the nutrient load in the Gulf of Finland. He emphasized the main issues as being to assess the role of mass exchange between the land surface and the atmosphere, in terms of loading and budget. Land heterogeneity and also human impact can cause complications.

30. The Task Force discussed the links between air and water pollution, in relation to potential reductions from agricultural practices. It was noted that there were significant synergies, but there could also be trade-offs, and both of these have to be addressed. It was suggested that to improve the integration between these policy areas, it would be very useful if the groups developing targets could actively interact with each other, and if possible define targets to be achieved on similar timescales, making the process far more tangible to those involved. The co-chair of the Task Force also commented that communication has been established between the Task Force and the Secretariat of the UNECE Water Convention, which may develop agricultural pollution as a key them in future.

IX. Nitrogen and the Green Economy

31. A representative of Denmark, Mr. S. Gyldenkaerne, started a discussion on the Green Economy in relation to nitrogen emissions, by presenting current developments in the organisation of agriculture in Denmark, which are hoped will contribute to the Green Economy. He noted that there are potential problems with some of the changes suggested in Denmark, each of which needs to be addressed. One such difficulty could be lower yields, from a push towards organic agriculture. The nature of 'Green Economy', 'Green Growth' and other terms were discussed, and the links between this and agriculture, sustainability and also the potential links to energy and industry. It was noted that as well as there being differing opinions on the aims of such 'green activity'- i.e. 'sustainability' versus 'growth' with minimal environmental impact - deciding on how to realise the chosen aims was also difficult. The Task Force agreed that the presentation and discussion was a useful preparation for future work and that the next focus would be to organise a workshop to take these discussions further and to engage with a range of stakeholders, potentially in cooperation with the Task Force on Integrated Assessment Modelling.

X. Future Work

32. The Task Force reviewed the previous workplan and updated the tasks and priorities accordingly. The future work, set out below, has been split into core/ongoing work and new items (with new and/or longer-term activities highlighted in italics and key focus areas in bold):

(a) Continue the work on nitrogen emission abatement from agricultural sources, develop technical and scientific information on an integrated approach to mitigation of agricultural nitrogen emissions with particular reference to the revision of the Gothenburg Protocol and, in particular:

(i) **Finalize the update of the Guidance Document;**

(ii) Continue to liaise with CIAM to examine the costs and benefits of ammonia emissions abatement measures;

(iii) ***Work on updating the Framework Code on Good Agricultural Practice for Reducing Ammonia; inform the deliberations of the Working Group on Strategies and Review on revisions to annex IX to the Gothenburg Protocol; and take account of the relevant BREFs;***

(iv) *Develop multi-pollutant approaches*;

(b) Continue providing technical information on making and using nitrogen budgets and estimating nitrogen emissions:

(i) At the national scale and for various system boundaries;

(ii) **Looking specifically at the farm scale;**

(c) Continue developing and providing technical and scientific information to support the revision of the Gothenburg Protocol in relation to the whole nitrogen cycle;

(d) Continue collecting and assessing information from the national focal points regarding their experiences, including any difficulties that they have in developing and implementing an integrated approach;

(e) Provide technical information on the effects of human diets on nitrogen use and emissions;

(f) **Liaise with countries in Eastern Europe, the Caucasus and Central Asia in the development of approaches for managing reactive nitrogen in industry and agriculture in order to:**

(i) Investigate the barriers to implementation of the Gothenburg Protocol;

(ii) Improve collaboration with the newly formed Coordinating Group for Eastern Europe, the Caucasus and Central Asia;

(g) Continue improving coordination of activities across and outside the Convention, and collaborate with subsidiary bodies under the Convention to complement the work of the subsidiary bodies of the Convention, in particular:

(i) Working with ICP Modelling and Mapping, focusing on critical loads and dynamic modelling of nitrogen effects, including the development of indicators through the use of

nitrogen budget approaches and links between nitrogen and climate, in cooperation with other bodies such as the OECD, EUROSTAT and UNEP;

(ii) With the Task Force on Emission Inventories and Projections, continue to ensure consistency between development of emission estimates and the estimation of efficiencies of agricultural emissions abatement; **organise a joint workshop as soon as feasible on agricultural emissions and projections;**

(iii) With the Task Force on Integrated Assessment Modelling, participate in relevant meetings, in particular providing advice to avoid pollutant swapping, and on effects of human behaviour, including dietary choices; **organise a joint workshop on nitrogen emissions and the green economy;**

(h) Further disseminate the results from the European Nitrogen Assessment and consider the longer-term perspective in relation to the potential of linking air pollution, water pollution and other environmental threats;

(i) Consider the vision and future possibilities for integrating nitrogen management within the Convention and in relation to other UNECE and international conventions; prepare an informal document on this topic;

(j) Hold the Task Force's eighth meeting, tentatively scheduled to be held in May 2013, and submit its report.

Annex A: Workshop resolution

WORKSHOP RESOLUTION	РЕШЕНИЕ СЕМИНАРА
ABATING AMMONIA EMISSIONS IN THE UNECE AND EECCA REGION IN THE CONTEXT OF THE NITROGEN CYCLE 29th February, 2012, Saint Petersburg Russia	СНИЖЕНИЕ ВЫБРОСОВ АММИАКА В РЕГИОНЕ СТРАН ЕЭК И ВЕКЦА В КОНТЕКСТЕ АЗОТНОГО ЦИКЛА 29 февраля 2012 г. Санкт Петербург, Россия
RECOGNIZING that the mandate of the UNECE Task Force on Reactive Nitrogen (TFRN) under the umbrella of the Convention of Long-Range Transboundary Air Pollution (CLRTAP) is (i) to provide technical information to be able to develop an integrated vision and approach to the abatement of reactive nitrogen (N_r) emissions and effects; (ii) to improve coordination on the development of integrated N_r policies; and (iii) to search for synergies between policies on air pollution and other policies,	ПРИНИМАЯ ВО ВНИМАНИЕ, что в сферу полномочий Целевой группы по химически активному азоту (TFRN) Европейской экономической комиссии ООН в рамках Конвенции о трансграничном загрязнении воздуха на большие расстояния (ТЗВБР) входит (i) предоставление технической информации для разработки комплексной концепции и подхода к снижению выбросов химически активного азота (N_r) и их последствий; (ii) улучшение координации разработки комплексной политики по химически активному азоту (N_r) (iii) поиск возможностей взаимодействия между стратегиями по борьбе с загрязнением воздушной среды и другими стратегиями,
APPRECIATING the hospitality of SZNIIMESH to host and co-organize the 7th meeting of the TFRN in Saint Petersburg, which allowed the participation of numerous specialists from EECCA countries, with the support of many other countries,	ВЫРАЖАЯ ПРИЗНАТЕЛЬНОСТЬ СЗНИИМЭСХ за гостеприимство и участие в организации 7-й сессии TFRN в Санкт Петербурге, что позволило приехать ряду специалистов из стран Восточной Европы, Кавказа и Центральной Азии (ВЕКЦА) при поддержке многих других стран,
RECOGNIZING that ammonia emission abatement is part of an integrated approach to the abatement of reactive nitrogen (N_r) emissions and their effects on acidification,	ОТМЕЧАЯ ТОТ ФАКТ, что снижение выбросов аммиака является частью интегрированного подхода к сокращению выбросов химически активного азота (N_r) и смягчению их

eutrophication, climate change, and that it can contribute to the nutrient use efficiency (nitrogen) of both plants and animals at local, regional and global scales,	воздействия на подкисление, эвтрофикацию, изменение климата и что такое снижение может способствовать эффективному использованию питательных веществ (азота) как растениями, так и животными на местном, региональном и глобальном уровне,
RECOGNIZING that the agricultural sector in EECCA countries is large and diverse, a one-day special workshop was organized to exchange information about options for ammonia emissions abatement in EECCA countries in the context of the nitrogen cycle as well as in countries of the UNECE region,	УЧИТЫВАЯ, что сельскохозяйственный сектор в странах ВЕКЦА обширен и разнообразен, был проведен однодневный практический семинар с целью обмена информацией о возможных вариантах уменьшения выбросов аммиака в указанных странах в контексте азотного цикла, а также в странах региона ЕЭК,
APPRECIATING that 47 delegates attended the workshop from 16 different countries: Azerbaijan, Belarus, Canada, Czech Republic, Denmark, Germany, Ireland, Italy, Kazakhstan, Moldova, the Netherlands, Romania, Russian Federation, Switzerland, Ukraine, and United Kingdom.	С УДОВЛЕТВОРЕНИЕМ КОНСТАТИРУЯ, что в семинаре приняли участие 47 делегатов из 16 стран мира: Азербайджан, Беларусь, Великобритания, Германия, Дания, Ирландия, Италия, Казахстан, Канада, Молдова, Нидерланды, Российская Федерация, Румыния, Украина, Чешская Республика и Швейцария,
THE WORKSHOP PARTICIPANTS RESOLVED	УЧАСТНИКИ СЕМИНАРА РЕШИЛИ
1. To endorse the research results, conclusions and proposals presented in the communications of the workshop participants.	1. Одобрить результаты научных исследований, выводы и предложения, изложенные в сообщениях участников семинара.
2. To promote the enhancement of cooperation and exchange of information between eastern and western countries.	2. Способствовать расширению сотрудничества и обмена информацией между восточными и западными странами.
3. To propose to establish an Expert Panel on Nitrogen in EECCA countries within the TFRN to a) recognise the unique systems and nitrogen management in these countries and b) to promote cooperation among EECCA countries and across the UNECE region, including	3. Выступить с предложением создать Экспертную группу по азоту в странах ВЕКЦА в рамках TFRN с целью а) принятия во внимание специфических систем и управления азотом в этих странах и б) развития сотрудничества между самими странами ВЕКЦА, а также со

cooperation with the other expert panels of TFRN. The focus of the panel should be (i) to increase awareness and knowledge on reactive nitrogen (Nr) emissions and (ii) to explore options for integrated nitrogen management to abate these emissions (iii) to update the agricultural emission factors in EECCA countries and to compare them with the EMEP/EEA Air pollutant emission inventory Guidebook within the Convention of Long-Range Transboundary Air Pollution (CLRTAP)	странами региона ЕЭК ООН. Основное внимание Экспертной группы должно быть направлено на (i) повышение уровня осведомленности и расширение объема знаний о выбросах химически активного азота (N_r); (ii) исследование различных вариантов комплексного управления азотом для снижения этих выбросов; (iii) уточнение коэффициентов выбросов из сельскохозяйственных источников в странах ВЕКЦА и сопоставление их с Руководством по инвентаризации выбросов ЕМЕП /ЕАОС, созданным в рамках Конвенции о трансграничном загрязнении воздуха на большие расстояния (ТЗВБР).
4. To coordinate the activity of the Expert Panel on Nitrogen in EECCA countries within TFRN with that of EECCA Coordinating Group, through the following: - Planning of joint events - Collaborative efforts to search for financing and realization of joint projects - Exchange of information and implementation of obtained achievements throughout the countries of the region - Translation of the documents of the Expert Panel on Nitrogen in EECCA countries into Russian and English language versions (where possible), to make them accessible to experts from a wide range of countries.	4. Координировать деятельность Экспертной группы по азоту в странах ВЕКЦА в составе TFRN с деятельностью Координационной группы стран ВЕКЦА путем: - планирования проведения совместных мероприятий - приложения совместных усилий для поиска финансирования и реализации объединенных проектов - обмена информацией и внедрения полученных результатов во всех странах региона - перевода документов Экспертной группы по азоту в странах ВЕКЦА на русский и английский языки (по возможности) для повышения их доступности экспертам большего количества стран.
5. To request the organizers and participants to publish the papers and communications of the workshop in the proceedings, and to explore the possibilities for an English-Russian edition of the proceedings.	5.Обратиться с просьбой к организаторам и участникам опубликовать доклады и сообщения в сборнике материалов семинара, а также рассмотреть возможность двуязычного издания материалов семинара.
6. To prepare a number of papers on the problems of reactive nitrogen for publication in	6. Подготовить ряд статей по проблеме химически активного азота для публикации в

leading scientific journals in EECCA countries.	ведущих научных журналах в странах ВЕКЦА.
7. To disseminate the workshop resolution to relevant and interested organizations in EECCA countries and bodies of the CLRTAP, specifically the members of the Working Group on Strategies and Review and the EECCA Coordinating Group.	7. Довести решение семинара до сведения соответствующих заинтересованных организаций в странах ВЕКЦА, а также руководящих органов Конвенции ТЗВБР, в частности, членов Рабочей группы по стратегиям и обзору и Координационной группы стран ВЕКЦА.
8. For more information contact the organizers of the special workshop - Natalia Kozlova (natalia.kozlova@sznii.ru, or nii@sznii.ru) and Klaas van der Hoek (Klaas.van.der.hoek@rivm.nl), or the co-chairs of TFRN (tfrn@ceh.ac.uk).	8. За более подробной информацией обращаться к организаторам данного специализированного семинара - Наталье Павловне Козловой (natalia.kozlova@sznii.ru или nii@sznii.ru) и Клаасу Ван дер Хуку (Klaas.van.der.hoek@rivm.nl) или со-руководителям TFRN (tfrn@ceh.ac.uk).