In March 2015 Transport & Environment provided input during the consultation on the revision of the EU Emission Trading System (EU ETS) Directive. However, most of the input provided was not considered in the proposal that was recently presented by the EC. Some of the main issues of concern for T&E that were not included in the proposal are presented below. These issues should be incorporated into the final legislative text throughout the co-decision process, both in Council and Parliament.

- **The issue of biomass zero-rating has not been dealt with**: Biomass usage is zero-rated in the EU ETS. Most of it used in the system (solid or gaseous) doesn't need to comply with any sustainability criteria and there are concerns that it might actually increase GHG emissions due to carbon debt and indirect impacts that are not accounted for. GHG smokestack emissions zero-rated in the EU ETS are in the range between 90 and 150 million t of CO2, which represents between 4 and 7% of the overall emissions allowances. The zero rating and the lack of sustainability requirements has been questioned by scientists and needs to be fixed.

  There are several reasons that justify halting it as soon as possible. First, we have no certainty that there are any GHG reductions due to the loopholes from the only partial application of IPCC guidelines. Secondly, even if accounting is robust, we need sustainability safeguards for bioenergy to prevent negative knock-on impacts, such as carbon debt and ILUC as well as on the biodiversity. They should include ILUC factors for all bioenergy grown on agricultural land, carbon accounting for woody biomass that considers changes in the carbon stocks of forests and waste hierarchy and cascading use principles for biomass based on wastes and residues. Biomass consumption is expected to increase by 40% by 2020, and an increasing part of it will come from outside the EU.

  It would also help to increase demand for allowances. Taking a conservative value of 100 million t per year, it would partially help to solve the existing surplus of EUAs in the system leading to an increased carbon price that is badly needed. Biomass already receives more than 8 billion EUR in RES support schemes per year. Having a support system on top through the EU ETS might create unfair competition with other forms of energy. It is also foregone revenues for EU governments' budgets which could otherwise be effectively channelled towards more effective climate policies.

  Although currently most of it for electricity and heat is supplied domestically, conservative estimates consider that by 2020 a gap of 21.4 Mtoe will have to be imported, equivalent to at least 15% of all EU primary bioenergy supply. It implies additional risks from an energy independence point of view.

  The co-legislators should:

  - Reassess the zero-rating policy in the EU ETS, taking into account the uncertainty with regards to CO2 savings. Scientists have suggested that accounting standards for GHGs should count all GHGs releases by the combustion of carbon as emissions, and should include additional plant growth or reduced decomposition of biomass as an offset, which together make up additional sequestration. One option could be to fully account for the smokestack emissions of biomass. Another option could be to develop sustainability criteria with a minimum emissions savings threshold for bioenergy - similar to GHG savings threshold that is currently part of the biofuels sustainability criteria. Then only the savings part would be allowed to count zero, which would be closer to reality but still relatively simple, as it would avoid full life cycle accounting for each pathway. These two options would be a simple way to improve the accounting, while the EC further looks into how the EU ETS could better

reflect the balance of the net effect of the production and use of bioenergy and get rid of perverse incentives that might increase GHG emissions.
    - Improve the reporting and transparency by including the bioenergy-only installations if they are above the 20 MW threshold, as an informative item only while the zero-rating criteria is reassessed. Otherwise it is hard to know the scale of the problem within the EU ETS. It should also be made mandatory to report CO2 emissions from biomass both at an installation and member state level under the Monitoring and Reporting Regulation to increase transparency.
    - Include ambitious environmental safeguards guiding the use of bioenergy in the RES policy for 2030, as set out in the Energy Union Communication. They should include full carbon accounting (including ILUC for biofuels and carbon debt for woody biomass), the efficiency standards that would guide the use of biomass only in the most efficient installations and sustainable management criteria covering the use of residues and wastes (including waste hierarchy and cascading use principles). It should also recognise that the amount of sustainable biomass is limited and place a cap on the maximum amount of biomass contribution to the EU renewable energy targets.

- **The innovation fund is not targeted enough and lacks to ensure the sustainability of the projects**: The EU needs immense innovation towards a low-carbon energy sector. Through the NER300 programme, the EU provides funding to potentially low-carbon innovation projects. Almost half of it has gone so far to bioenergy projects. However, EU bioenergy policy lacks any kind of sustainability criteria and has several loopholes (ILUC factors, carbon debt), which put GHG savings of this source of energy under question. The science has shown that the environmental performance of bioenergy depends on production method and management practice, which is not appropriately reflected in the policy and in related financial support mechanisms such as NER300. Unless strong environmental and social safeguards are in place to ensure the long-term sustainability of these projects, it is questionable whether massive public support should be given to projects that don't have a clear climate and environmental benefit. One non-regret option would be to support bioenergy projects based on the use of wastes and residues, but even here sustainability criteria, such as waste hierarchy and cascading use principle are of crucial importance. The innovation fund should focus on technologies that have clear potential to decarbonise our economy and can be scalable. The NER300 programme defines two sets of eligibility criteria: the level of innovation and sustainability. The level of innovation criteria are defined by the NER300 call for proposals. When it comes to sustainability criteria applied to bioenergy projects, however, the NER300 is merely referring to the criteria defined in the RES directive. The existing flaws on these criteria, therefore, are reflected in this programme. The problem is that EU bioenergy policy is far from perfect, which is reflected in this multi-billion support programme. In the application for the programme, it was needed to include a confirmation that the sustainability criteria would be met for biofuel or bioliquid produced. However, these criteria are insufficient to demonstrate if the considered project will effectively result in GHG emission savings. Most of the projects in NER300 use woody biomass. There are no sustainable criteria in place for solid biomass it. In addition, a CO2 balance was required to apply for the programme. However, the concept of 'carbon debt' is not included. The time needed to reach 'carbon neutrality' might be in the range of decades, while short term emission reductions are needed. Indirect Land Use Change (ILUC) emissions are currently not included in the life cycle analysis of biofuels in the RES directive and as a consequence they

are not considered when assessing the eligibility of projects in this domain. Therefore, it is hard to assess the real contribution of these projects.
The innovation fund will need to be designed during the following years. In order to improve the programme from previous calls for proposals, these issues should be considered even in the absence of a perfect bioenergy policy at an EU level.

- **Aviation and shipping were not addressed in the proposal**: Emissions from aviation and shipping pose a great challenge for EU climate policy as international emissions from both sectors are expected to grow by up to 250% by 2050. Following the Commission's Energy Union Communication, which called for actions that cover all sectors and sources of emissions and made clear that aviation and shipping are in the 2030 target, ambitious reduction targets as well as meaningful implementing measures are needed. Both ICAO and IMO have failed to meet their Kyoto obligations to limit and reduce emissions. IMO has to date failed to set an emissions reduction target and debate on an MBM has been stalled for three years. The IMO adopted a design efficiency standard for all new ships built in 2013 onwards. However, such efficiency measures will be outpaced by growth in demanding, causing an increase in emissions of between 50% and 250% according to the 3rd IMO GHG study.
    - **Shipping**: it is the only sector of the EU economy without a reduction target set in law despite concrete commitments in the EU climate legislation in 2009, the Commission's 2011 White Paper on Transport and the Commission's 2013 Communication setting out a strategy for maritime emissions. The EU's climate and energy policy set a deadline of 2011 for all sectors of the economy to contribute to achieving emission reductions, including international maritime shipping. The 2011 Transport White Paper calls for 2005 level emissions from maritime transport to be cut by at least 40% by 2050, and if feasible by 50%. When introducing the MRV proposal in 2013, the Commission announced that it would be followed by the adoption of a reduction target and by implementing measures including MBMs. The EU MRV has now been agreed and enters into force this year. Since European maritime transport activities are expected to increase by 8% in 2020, by 15% in 2030 and by 39% in 2050, the EU should now make clear how it intends to deliver shipping reductions within its 2030 commitment by establishing an EU reduction target and measures. The most straightforward approach is the following:
        a) make shipping subject to the ETS rules, i.e. companies shall surrender allowances as other industries in Europe have to do;
        b) by way of derogation, companies may instead make a voluntary contribution to a compensation fund or join a target based compensation fund as set out in the Commission's 2013 Impact Assessment.
    - **Aviation**: International aviation is currently exempt from fuel taxation and VAT and, unlike in other modes, there are no fuel efficiency standards. Intra EU and domestic aviation is subject to the ETS remains but its reduced scope only covers 27% of departing emissions. At the global level ICAO has undertaken to develop and commit in 2016 to a global MM to deliver carbon neutral growth from 2020 (CNG 2020). The EU will then review existing ETS legislation depending on the extent of progress at ICAO. If ICAO agrees an effective global MBM at their assembly in 2016, its target of Carbon Neutral Growth by 2020 will be insufficient to meet the EU's domestic objective of a 40% cut by 2030. There will therefore be a crucial role for aviation in the EU ETS, which must interact with the global MBM to ensure all emissions are

covered by a robust scheme. As in other sectors, the stringency of the cap must be sufficient to ensure a reduction in emissions in line with the 40% target. An additional problem with the aviation ETS is the lack of transparency on whether there is uniform and correct enforcement. Member states are continuing to withhold information on non-compliant airlines, despite the clear public interest in sufficient enforcement. On the 2016 aviation ETS review, the revision should focus on:

a) A tightening of the cap on aviation which will require airlines to purchase more allowances;
b) Increased transparency in the enforcement of aviation in the ETS, including a clear deadline for when member states must publish lists of non-complaint airlines
c) A clear statement on how the EU ETS scheme will have a role to play post-2016 for those aviation emissions not covered by a global MBM.

- **The option of including transport in the ETS has not been deleted from the proposal**: As part of the 2030 climate discussions German carmakers have been advocating the inclusion of road transport emissions in the EU ETS. The inclusion of transport in the ETS, either at the EU level or at the national level by individual member states, is a very bad idea because:

  1. It would delay and reduce the rate of emissions reductions in transport, putting at risk the achievement of climate and energy security goals and increasing costs;
  2. It would undermine much more effective specific climate policies for transport such as standards for vehicle efficiency and clean fuels for 2025 and 2030, which stimulate investment in low-carbon technology in the transport sector;
  3. It would weaken rather, than strengthen the ETS, and increase, not reduce, costs because it shifts carbon reduction away from the – sheltered – transport sector to potentially exposed ones.

  More details at http://goo.gl/W65MKE and http://goo.gl/S4DaXv