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Atmospheric aqueous phase chemistry: Similarities and differences to surface water chemistry

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Since the inception of the concept that aqueous phase chemistry occurs in the troposphere, there has been fruitful interconnections and interaction with surface water chemistry. During this presentation it will be discussed how transfer of knowledge worked from one research area to another. It seems cross-talk and interconnection of the work discussed here can be fruitful for either side.

First, a short report is given how interaction with inorganic chemistry research works successfully in the past with a focus on past European projects. Here, good examples exist on how to widen the expertise of existing networks.

Second, some examples of important interconnections of surface water chemistry towards aqueous phase atmospheric chemistry are discussed. These will be taken from non-organic systems and include photochemistry, such as nitrate photolysis.

In the third part it is discussed whether or not professional organic chemistry and atmospheric chemistry are in fruitful exchange and how that might be fostered more as apparently organic multiphase chemistry in the troposphere still needs further development.

Finally, a summary together with an outlook will be given.

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