



Session 2

Atlantic control of the late-19th century Sahel humid period

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Abstract

Precipitation regime shifts in the Sahel have dramatic humanitarian and economic consequences such as during the 1970's and 1980's severe droughts. Though Sahel precipitation changes during the late 20th century have been extensively studied, little is known about the decadal variability prior to the 20th century. Some evidences suggest that during the second half of the 19th century the Sahel was as much or even more rainy than during the 1950's and 1960's. Here, we reproduce such anomalous Sahel humid period in the late-19th century by means of climate simulations. We show that this increase of rainfall was associated with an anomalous supply of humidity and higher-than-normal deep convection in the middle and high troposphere. We present evidence suggesting that Sea Surface Temperatures (SSTs) in the Atlantic basin played the dominant role in driving decadal Sahel rainfall variability in this early period.



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The both last ICAWA edition, 2017 and 2018, was done as a joint event with other closely related meeting. In 2017 with the inauguration of the OSCM in Cabo Verde underlining AWA cooperation with INDP and UNICV as well as Geomar and collaborators. In 2018 ICAWA was join to Preface final meeting following the memorandum of understanding signed a couples of years before between the two consortium and which have led at the end to a common policy session followed by the redaction of a policy brief taking advantage of the results of the both projects. Some abstract aside ICAWA joint session are missing see the orgniser to get more information.

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These two edition of ICAWA were joint with OSCM inauguration and the final meeting of the European preface project, respectively in 2017 and 2018.



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Session 2.3: « Climate variability and teleconnections». Wednesday 18th April 2018

Poster presentation