

Dr. Daniel Fischer is currently heading the Ground Segment System and Cybersecurity Engineering Section in the Ground Segment Engineering and Innovation Department at the European Space Operations Centre (ESOC) of the European Space Agency. He joined the Agency in 2009 and since then has been active in the standardisation community, and CCSDS in particular. He has been a main driver behind several key standards' developments, for example the Space Data-Link Layer Security protocol, which is the first successful secure communication protocol that CCSDS has published and now widely adopted by missions. From 2018 to 2023 he was the deputy chair of the Security WG. In this role he has helped to develop the group into a cross-functional support entity, pooling the cybersecurity expertise in one focal place, and working with other working groups across all CCSDS areas to strengthen the security posture of CCSDS standards and answer to the needs of the missions. This has benefitted for example the standards' portfolio published by the Spacecraft Monitoring & Control working group and the Delay Tolerant Networking working group. He has also pioneered the cloud-based interoperability testing principle for CCSDS, which significantly lowers the difficulties of interfacing reference implementations for CCSDS standards between agencies and has been published as a Yellow Book. Dr. Fischer is now also co-leading the creation of an IOAG security working group to further focus the security standards development perspectives for CCSDS for the benefit of future missions. In 2023 Dr. Fischer was appointed Area Director for the Mission Operations and Information Management (MOIMS) Area.

Since he received his PhD in computer science for his work on secure routing for spacecraft networks, he has been actively publishing CCSDS-related papers and articles in conferences and journals to widen the impact of CCSDS in the space community. His team has been very active in developing reference implementations and interoperability testing for the security, spacecraft monitoring and control, and delay tolerant networking groups as well as for IOAG.