The AuScope Geochemistry Network and the AusGeochem geochemistry data platform

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The AuScope Geochemistry Network (AGN, www.auscope.org.au/agn) was established in 2019 in response to a community expressed desire for closer collaboration and coordination of activities between Australian geochemistry laboratories. Its aims include: i) promotion of capital and operational investments in new, advanced geochemical infrastructure; (ii) supporting increased end user access to laboratory facilities and research data; (iii) fostering collaboration and professional development via online tools, training courses and workshops. Over the last six months, the AGN has coordinated a monthly webinar series to engage the geoscience community, promote FAIR data practices and foster new collaborations. These webinars were recorded for future use and can be found at: www.youtube.com/channel/UC0zzzc6_mrjEEdCS_G4HYgg.

A primary goal of the AGN is to make the networks’ laboratory geochemistry data, from around the globe, discoverable and accessible via development of an online data platform called AusGeochem (www.auscope.org.au/ausgeochem). Geochemical data models for SHRIMP U-Pb, Fission Track, U-Th/He, LA-ICP-MS U-Pb/Lu-Hf and Ar-Ar are being developed using international best practice and are informed by expert advisory groups consisting of members from various institutes and laboratories within Australia. AusGeochem is being designed to provide an online data service for analytical laboratories and researchers where sample and analytical data can be uploaded (privately) for processing, synthesis and secure dissemination to collaborators. Researcher data can be retained in a private space but studied within the context of other publicly available data. Researchers can also generate unique international geo sample numbers (IGSNs) for their samples via a build in link to the Australian Research Data Commons IGSN registry.

AusGeochem supports FAIR data practices by providing researchers with the ability to include links to their AusGeochem registered data in research publications, providing a potential opportunity for AusGeochem to become a trusted data repository.