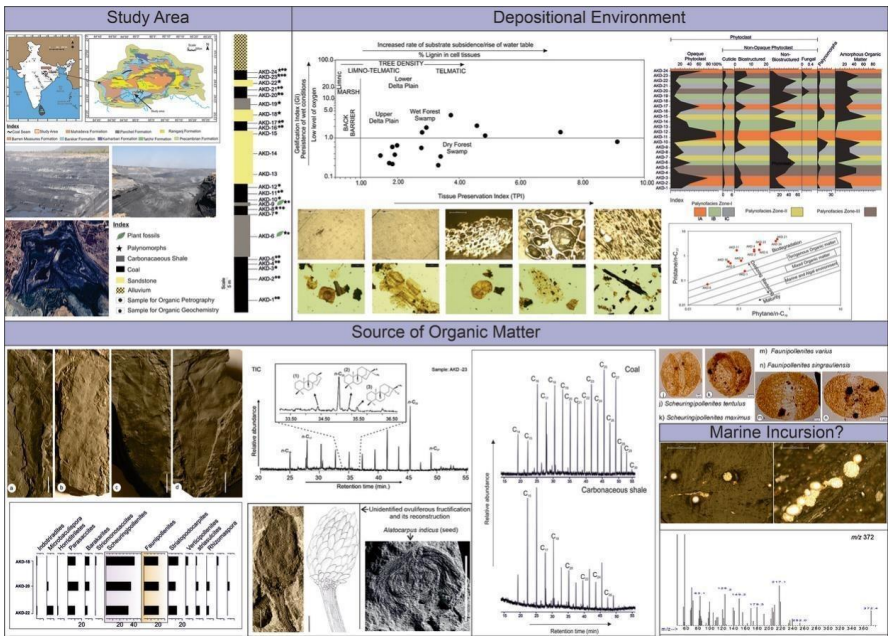
Birbal Sahni Institute of Palaeosciences
Monthly Summary of Research Activities

Key Scientific Findings of the Month (August 2025)

The coal-bearing succession associated with the Ashoka Coal Mine in the North Karanpura Basin has been studied to ascertain the palaeovegetation, palaeoecology and depositional settings. The basin contains an excellently preserved diverse plant fossil assemblage of Lower Gondwana successions. The megafossil assemblage retrieved from sediments shows rich floral diversity comprising 3 genera (Gangamopteris, Glossopteris, Vertebraria) and 14 species. Interestingly, one specimen features a remarkably well-preserved fructification of glossopterid affinity. The recovered palynoassemblage is dominated by palynomorphs belonging to Glossopteridales, with the domination of the Scheuringipollenites spp. (non-striate bisaccate pollen) and co-domination of the Faunipollenites (=Protohaploxypinus) spp. (striate bisaccate pollen). The dominance of Glossopteridales in both megafossil and microfossil assemblages suggests that warm and humid tropical conditions prevailed during deposition. While resembling the flora of the Barakar Formation in the Damodar Basin, this assemblage displays distinctive characteristics and is of Artinskian age. Major highlights of Sahu et al (2025) include: (a) Well-preserved glossopterid fructification is documented for the first time; (b) Significantly higher plant input and dry forest swamp conditions were inferred; (c) Predominance of inertinite macerals and of opaque phytoclasts suggests an oxic realm; (d) A sudden rise in mineral matter indicates flood events & (e) Framboidal pyrite and elevated sulphur point to brackish settings or marine influence.



1. Life skill and Emotional Intelligence Workshop (07 Aug 2025)
2. User Awareness Webinar on "One Nation One Subscription (ONOS; 13 Aug 2025)
3. Wiley-ONOS all India workshop (20 Aug 2025, Virtual mode)
4. MOU signed between BSIP and IGNCA (12 Aug 2025)

Nine (9) Research papers were published in renowned high impact factor Journals.

Photographs showing important highlights of major programs/research activities organized during Aug 2025: