

ESI 5: PCA scores plots of omics data

Principal components analysis (PCA) scores plots of transcriptomic, lipidomic and metabolomic data derived from exposure of A549 cells to silver, zinc and CeO₂ nanoparticles, microparticles and/or ions.

For silver, control samples are shown in black, Ag NP-NM300K treated in red, Ag MP in cyan, Ag⁺ in blue.

For zinc, control samples are shown in black, ZnO NP-NM110 in red, ZnO NP-NM111 in cyan, Zn²⁺ in blue and ZnO MP in pink.

For CeO₂, control samples are shown in black, CeO₂ NP-A treated in red, CeO₂ NP-C in cyan, CeO₂ NP-E in blue and CeO₂ NP-NM212 in pink.

Supplementary material of:

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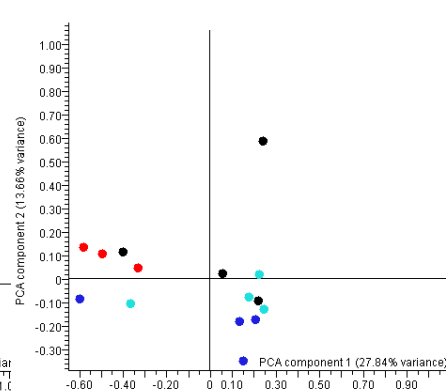
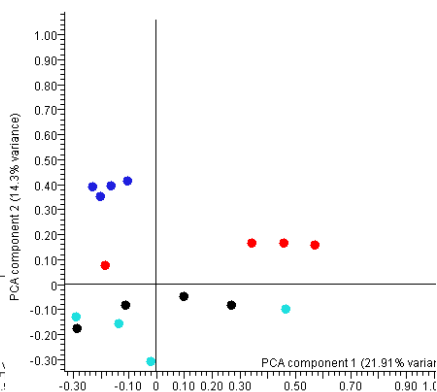
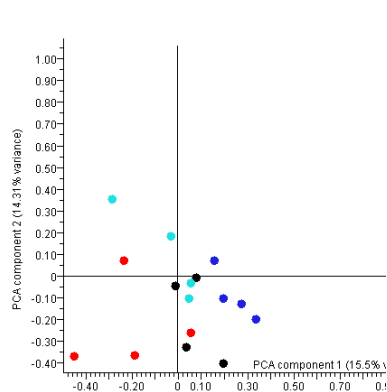
Silver

1 hour

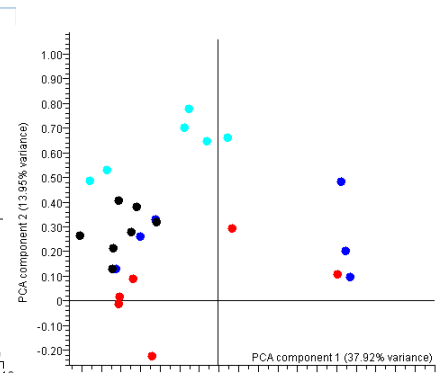
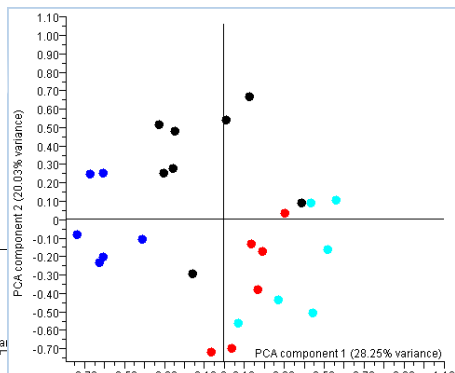
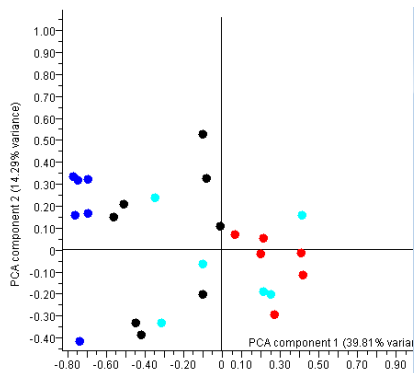
6 hours

24 hours

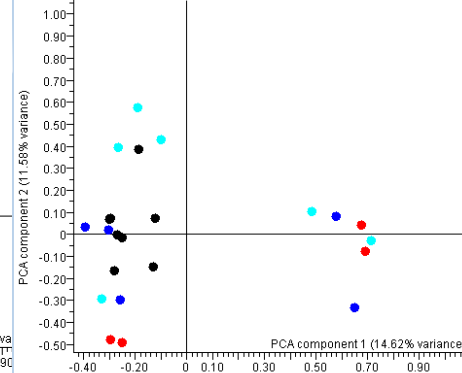
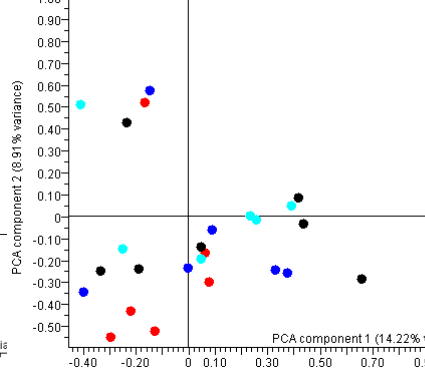
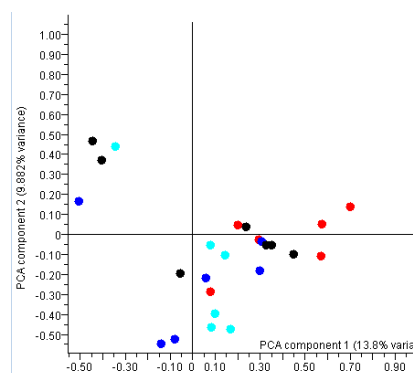
Transcriptomics



Polar metabolomics



Lipidomics



control samples are shown in black,
 Ag NP-NM300K treated in red,
 Ag MP in cyan,
 Ag⁺ in blue.

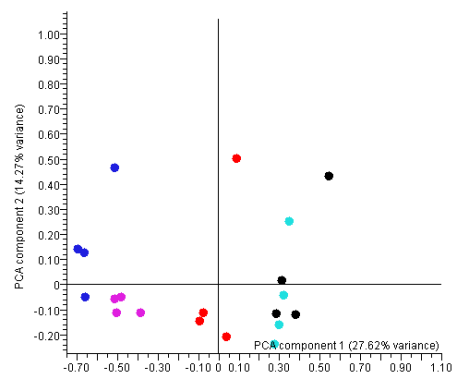
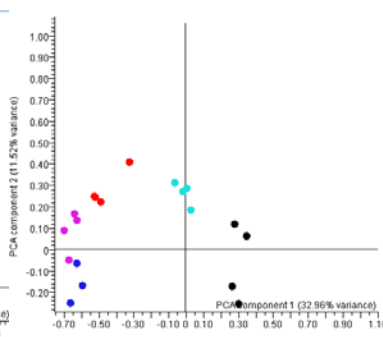
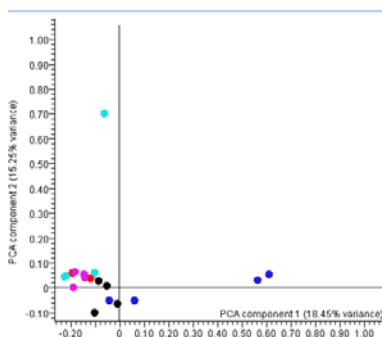
Zinc

1 hour

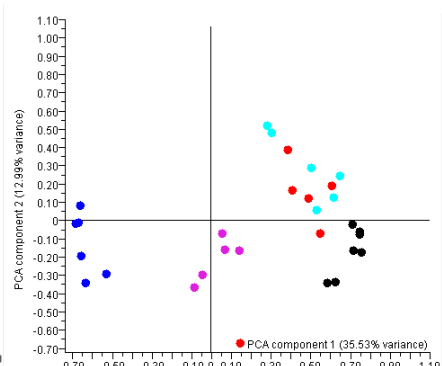
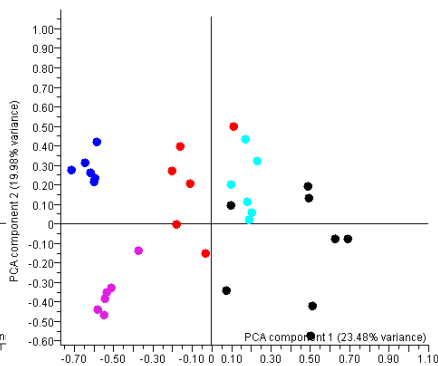
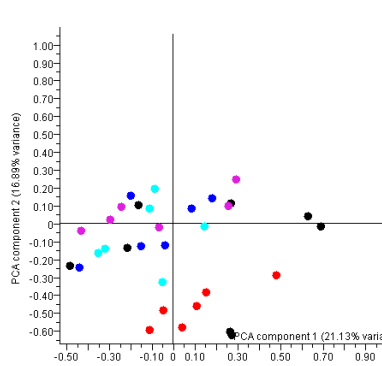
6 hours

24 hours

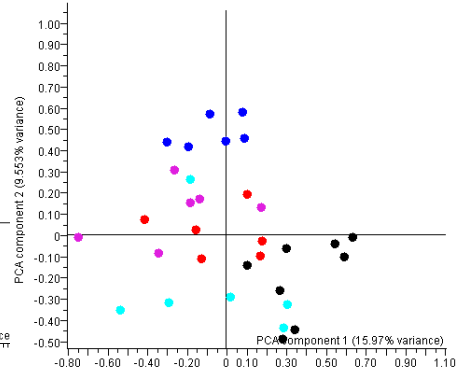
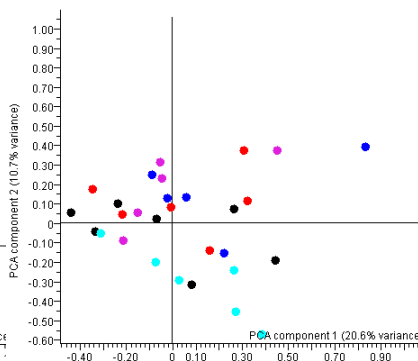
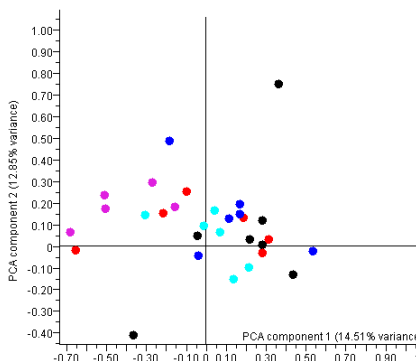
Transcriptomics



Polar metabolomics



Lipidomics



control samples are shown in black,
ZnO NP-NM110 treated in red,
ZnO NP-NM111 in cyan,
Zn₂₊ in blue
ZnO MP in pink.

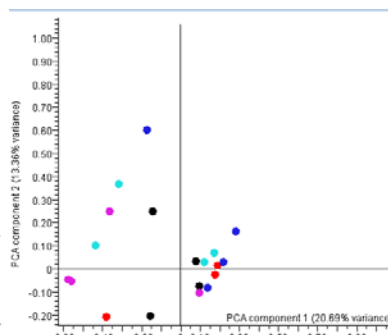
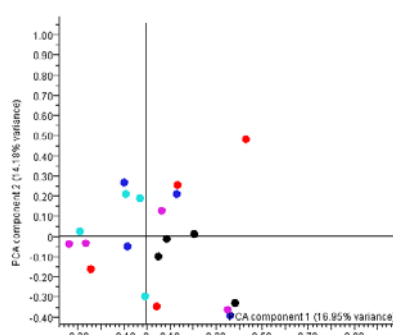
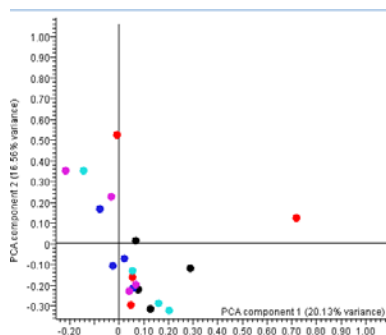
CeO₂

1 hour

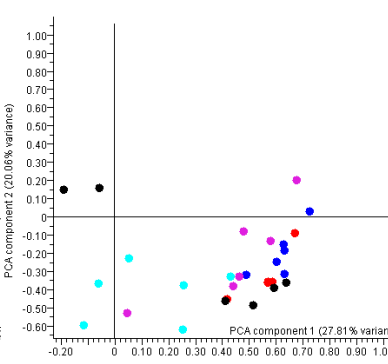
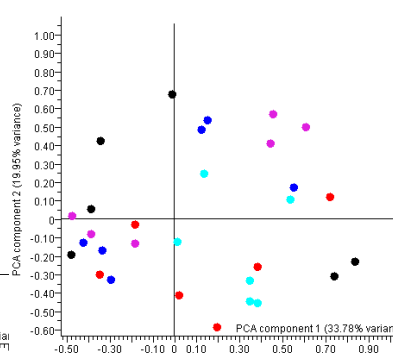
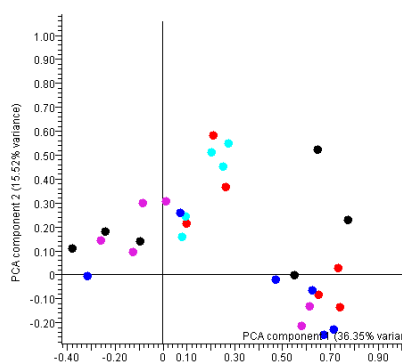
6 hours

24 hours

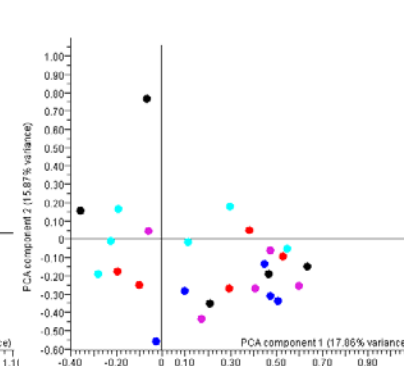
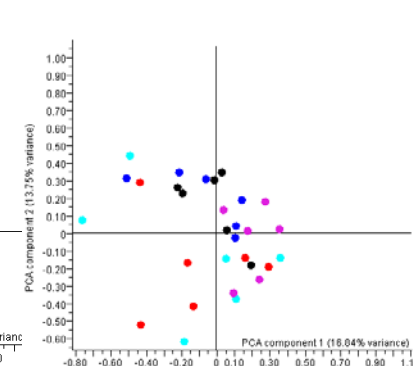
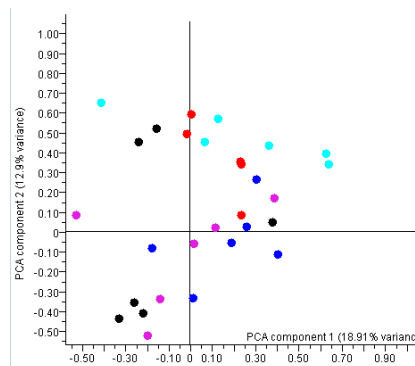
Transcriptomics



Polar metabolomics



Lipidomics



control samples are shown in black,
CeO₂ NP-A treated in red,
CeO₂ NP-C in cyan,
CeO₂ NP-E in blue
CeO₂ NP-NM212 in pink.