

Fig. 1 Map of Ghana showing the cocoa-growing regions where the cocoa beans were sampled from

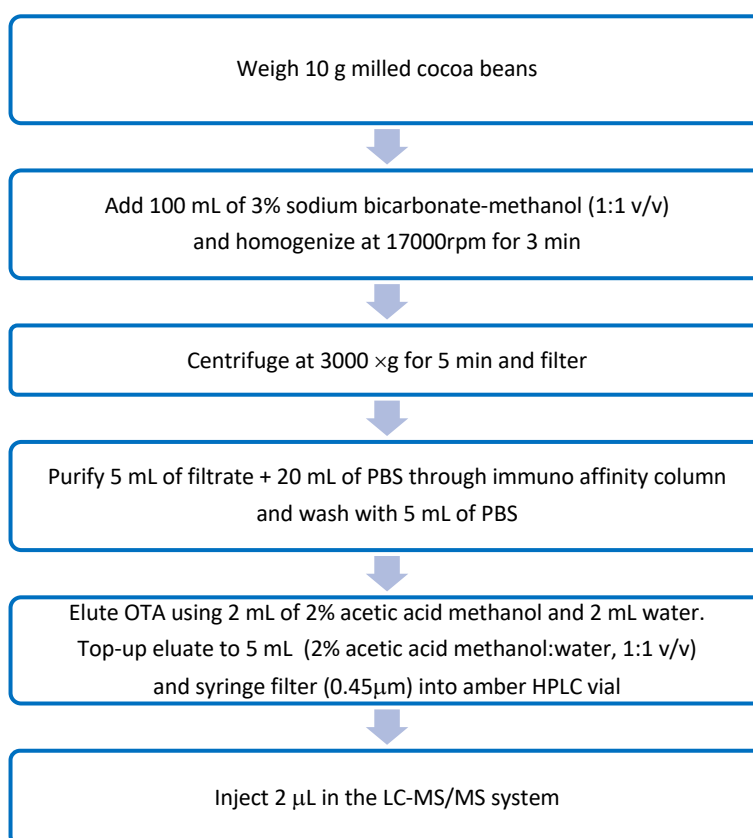


Fig 2. Sample preparation workflow for the analysis of OTA in cocoa beans

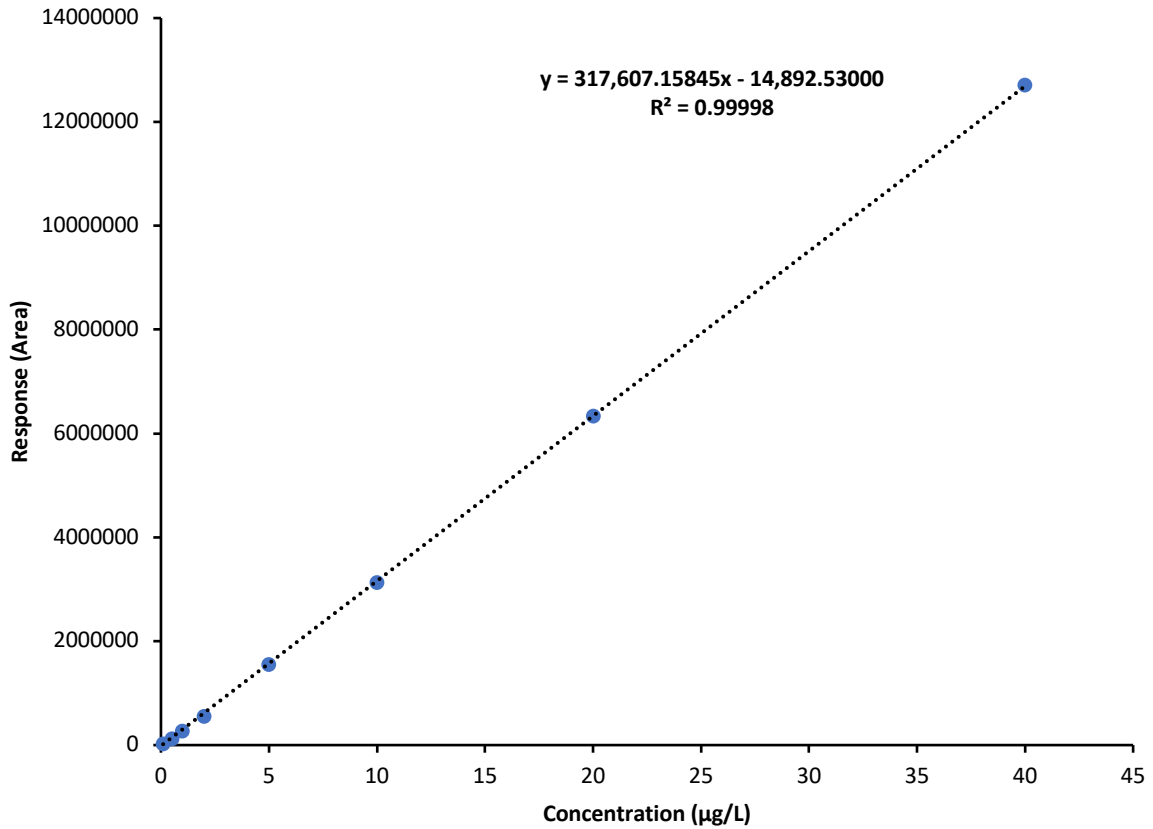


Fig 3. Calibration curve of OTA with a satisfactory correlation coefficient (R^2) over a widely tested dynamic linear range

Q 404.30>239.00 (+) 4.89e3 Q 404.30>239.00 (+) 4.56e3 Q 404.30>239.00 (+) 8.16e2

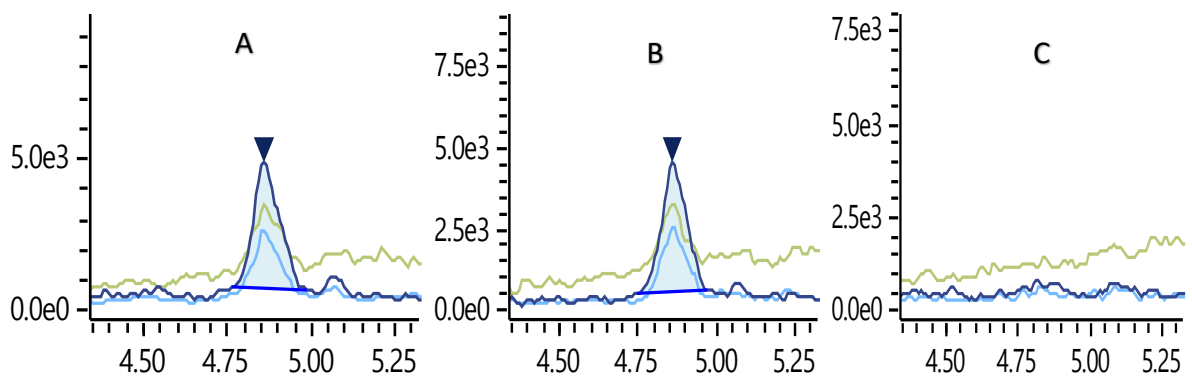


Fig 4. Representative chromatogram corresponding to LC-MS/MS analysis of OTA; (A) in standard solution at LOQ, (B) in sample spiked at 1 µg/kg, (C) in the blank sample.

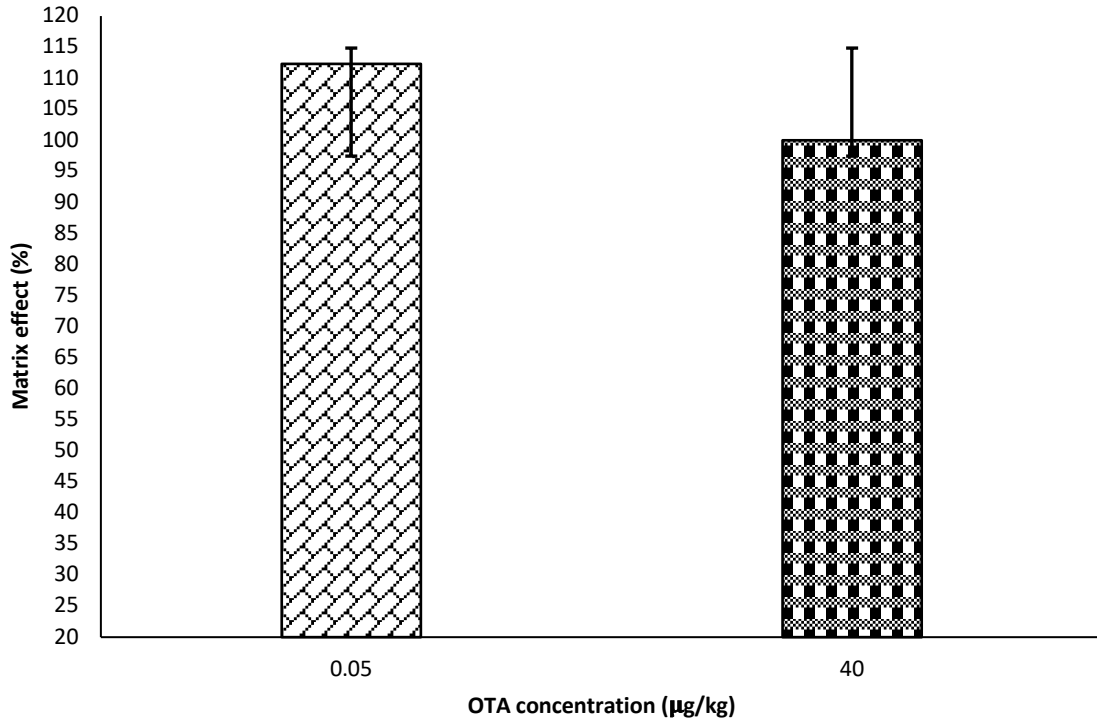


Fig 5. Assessment of matrix effect in LC-MS/MS analysis of OTA

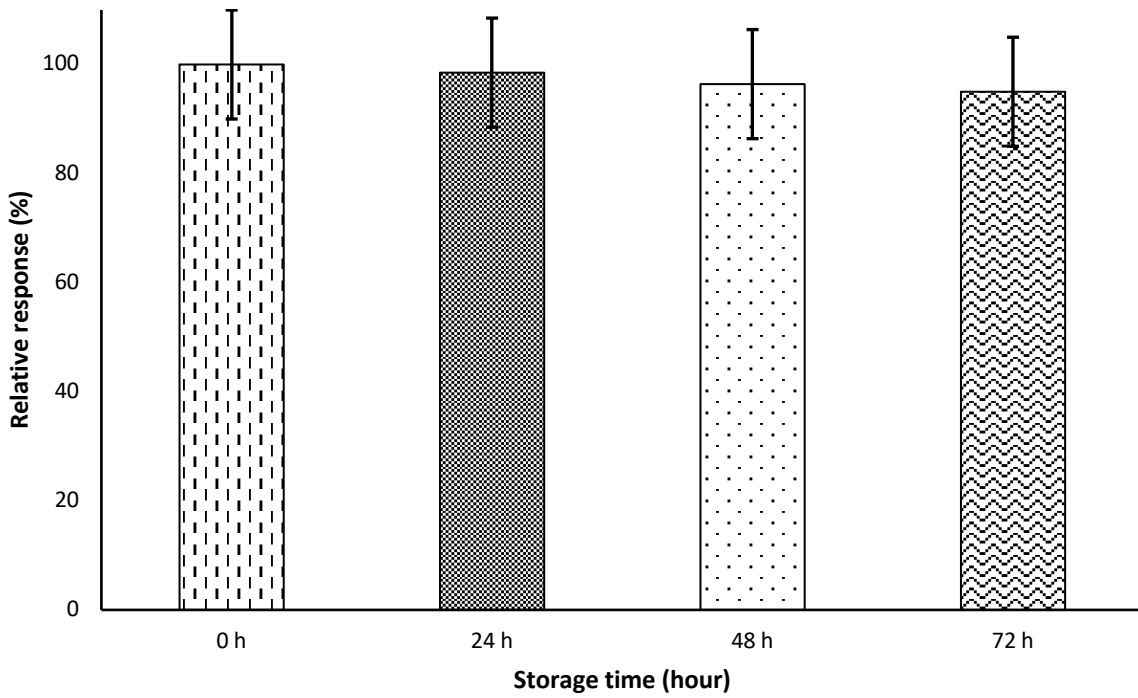


Fig 6. Assessment of stability of OTA samples after 24, 48, and 72 hours of storage in the autosampler at 10 °C

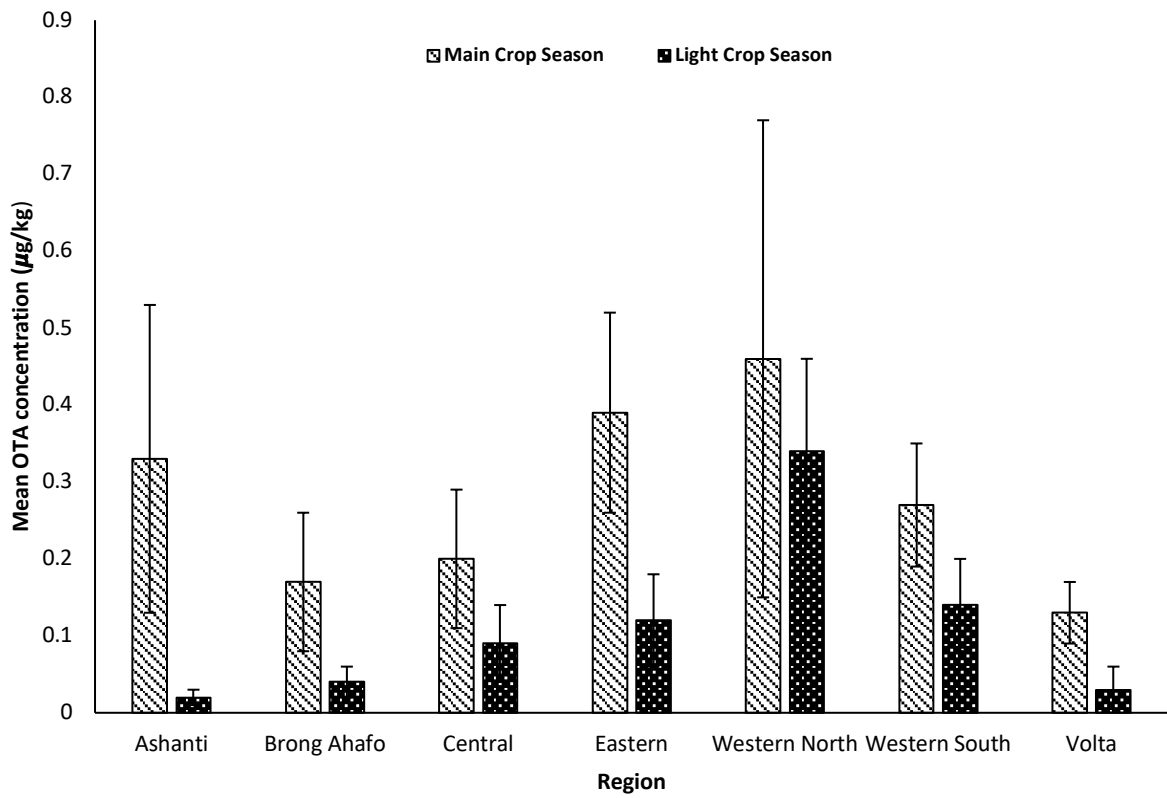


Fig 7. Distribution of mean incidence of OTA in cocoa beans across the cocoa-growing regions of Ghana during the main and light crop seasons