

Supporting Information

Investigation of the Oxidation Behavior of Graphene/Ge (001) Vs. Graphene/Ge (110) Systems

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As mentioned in the text, the oxidation of graphene-covered Ge(001) and Ge(110) substrates were monitored for more than seven months. Figures S1a and S1b depict C1s photoelectron spectra of graphene/Ge(001) and Ge(110) samples immediately after the growth and after multiple weeks in ambient conditions, respectively.

O1s spectra of as-deposited and air-exposed graphene/Ge(001) and Ge(110) systems are displayed in Figure S2. Figure S3 shows the Ge2p photoelectron spectra of as-deposited and air-exposed graphene/Ge(001) and Ge(110) samples.

C1s

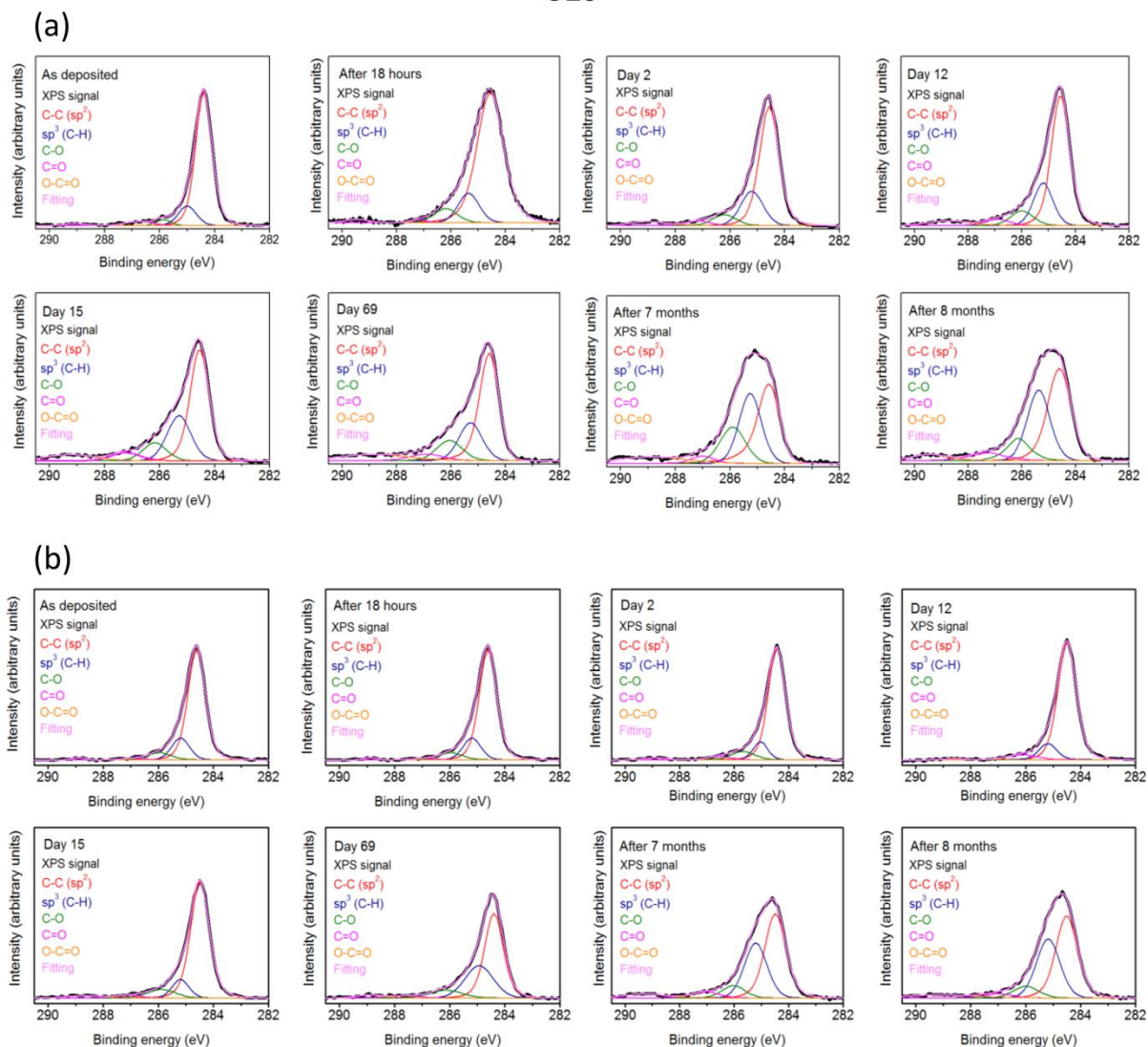


Figure S1. C1s spectra of (a) graphene covered Ge(001) and (b) graphene covered Ge(110) samples as a function of time.

O1s

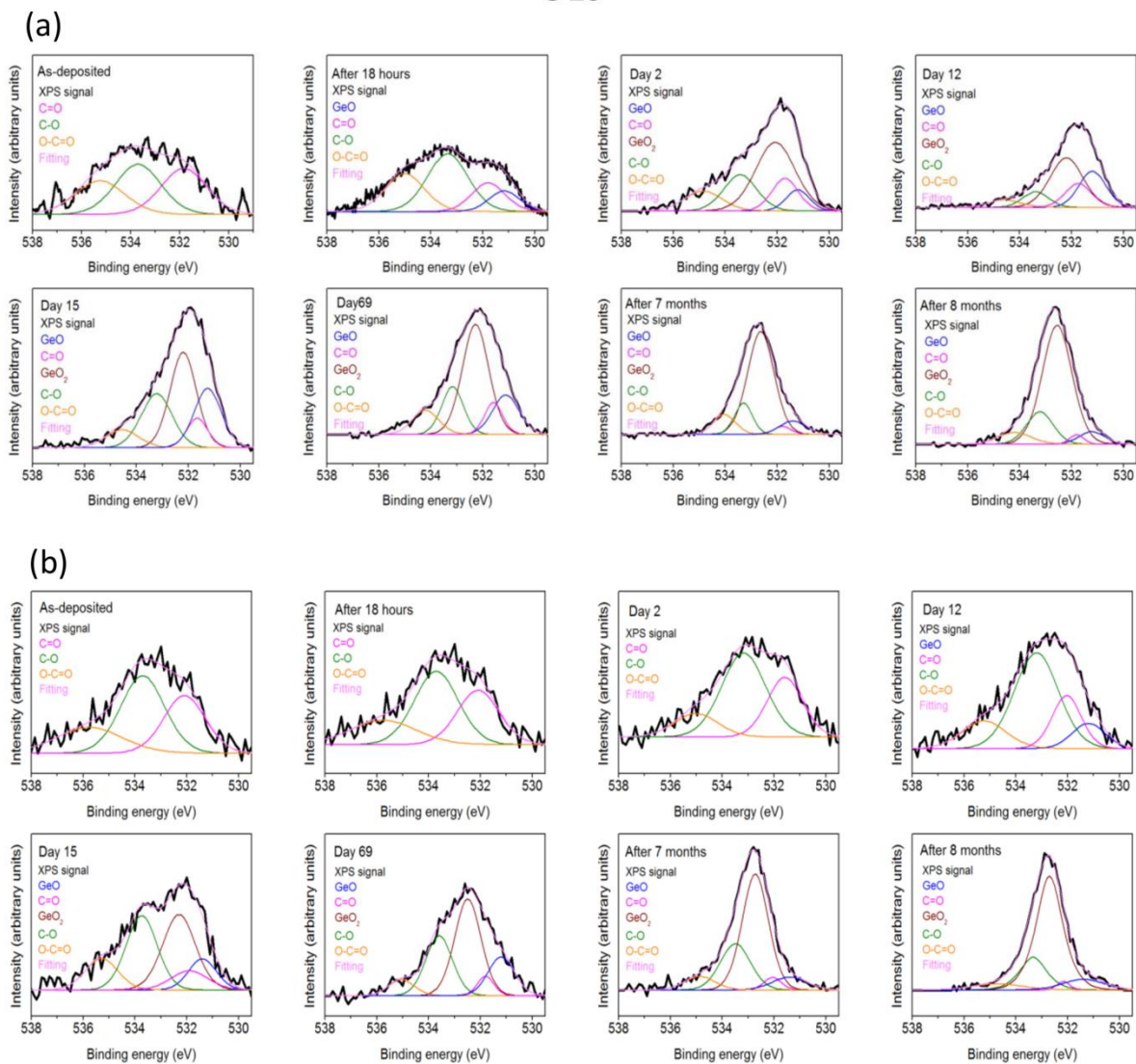


Figure S2. O1s spectra of (a) graphene/Ge(001) and (b) graphene/Ge(110) samples as a function of time.

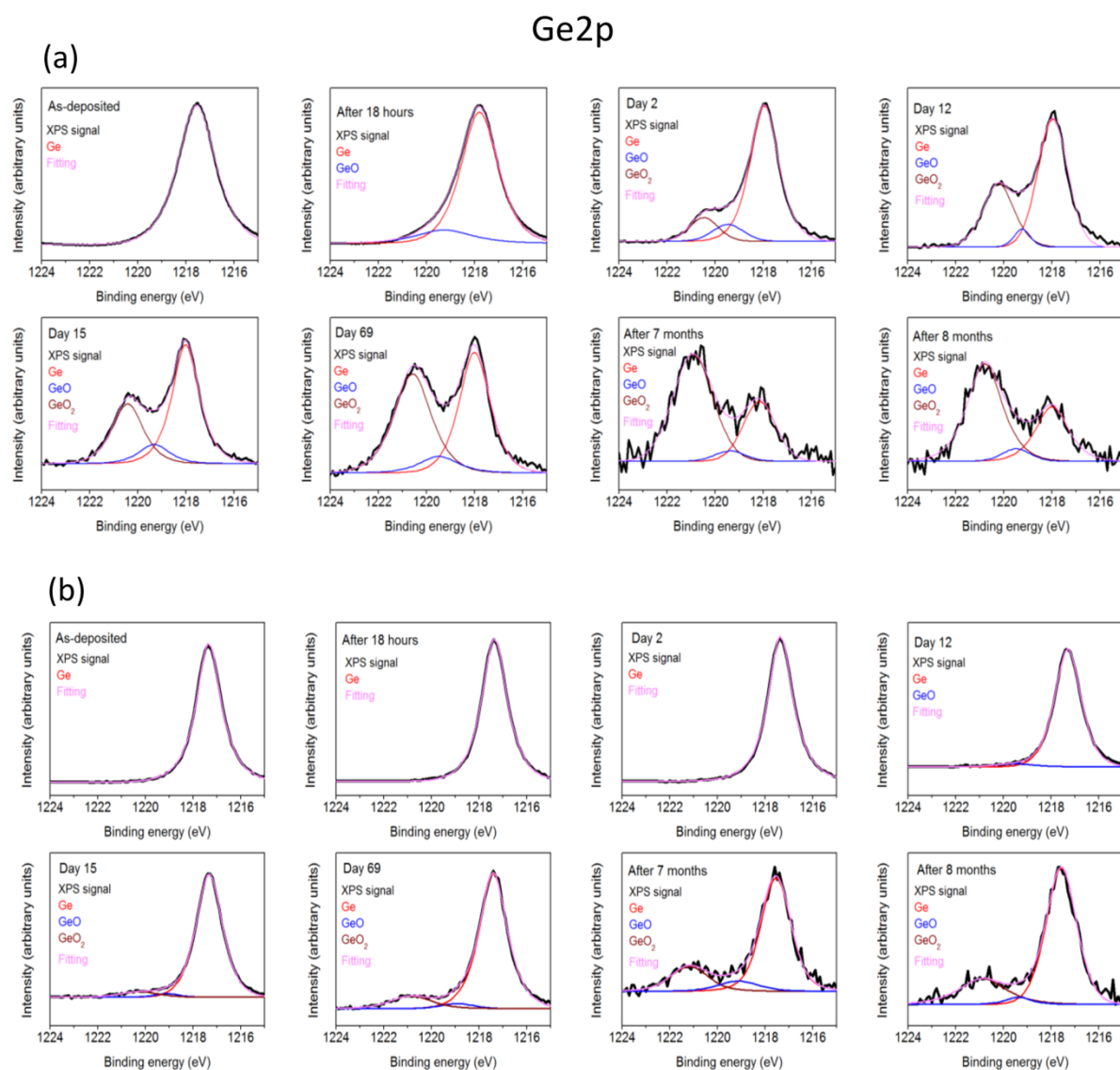


Figure S3. Ge2p spectra of (a) graphene/Ge(001) and (b) graphene/Ge(110) samples as a function of time.