## **Description of Additional Supplementary Files**

File Name: Supplementary Data 1

Description: Clinical characteristics of GC patients.

File Name: Supplementary Data 2

Description: The result of targeted sequencing.

File Name: Supplementary Data 3

Description: Lists of differentially expressed proteins in tumor tissues and NATs.

File Name: Supplementary Data 4

Description: Lists of differentially expressed proteins in DGC and IGC.

File Name: Supplementary Data 5

Description: Characteristics of proteomic subtypes.

File Name: Supplementary Data 6

Description: TF activity characteristics of 196 GC patients.

File Name: Supplementary Data 7

Description: Immune infiltration signatures in GC.