Supplementary Table 2. Clinical characteristics by SWI/SNF and KRAS mutation status in cohort 1

| Characteristics                           | Total N=146 | SWI/SNF-mut N=18 | Non-SWI/SNF-mut KRAS-wt N=128 | p Value |
|-------------------------------------------|-------------|------------------|-------------------------------|---------|
| Age, median (range)                       | 61(35-84)   | 58(44-75)        | 62(35-84)                     | 0.650   |
| Sex (%)                                   |             |                  |                               | 0.780   |
| Male                                      | 93(68.9)    | 12(66.7)         | 81(63.3)                      |         |
| Female                                    | 53(31.1)    | 6(33.3)          | 47(36.7)                      |         |
| Smoking status (%)                        |             |                  |                               | 0.811   |
| Current or ever                           | 72(61.4)    | 10(55.6)         | 62(52.5)                      |         |
| Never                                     | 64(38.6)    | 8(44.4)          | 56(47.5)                      |         |
| N.A.                                      | 10          | 0                | 10                            |         |
| Family history of cancer (%)              |             |                  |                               | 0.295   |
| Yes                                       | 46(40.4)    | 8(44.4)          | 38(31.9)                      |         |
| No                                        | 91(59.6)    | 10(55.6)         | 81(68.1)                      |         |
| N.A.                                      | 9           | 0                | 9                             |         |
| ECOG (%)                                  |             |                  |                               | 0.132   |
| 0                                         | 42(29.0)    | 2(11.1)          | 40(31.5)                      |         |
| ≥1                                        | 103(71.0)   | 16(88.9)         | 87(68.5)                      |         |
| N.A.                                      | 1           | 0                | 1                             |         |
| Histology (%)                             |             |                  |                               | 0.064   |
| Adenocarcinoma                            | 115(73.8)   | 13(72.2)         | 102(79.7)                     |         |
| Squamous                                  | 24(18.0)    | 2(11.1)          | 22(17.2)                      |         |
| Others\footnote{3}                        | 7(8.2)      | 3(16.7)          | 4(3.1)                        |         |
| Stage (%)                                 |             |                  |                               | 0.643   |
| III                                       | 26(13.1)    | 2(11.1)          | 24(18.8)                      |         |
| IV                                        | 120(86.9)   | 16(88.9)         | 104(81.3)                     |         |
| Metastatic sites (%)                      |             |                  |                               | 0.152   |
| Brain                                     | 30(20.5)    | 6(33.3)          | 24(18.8)                      |         |
| Bone                                      | 47(32.2)    | 6(33.3)          | 41(32.0)                      |         |
| Liver                                     | 19(13.0)    | 3(16.7)          | 16(12.5)                      |         |
| PD-L1 expression (%)                      |             |                  |                               | 0.855   |
| <1%                                       | 29(21.6)    | 3(25.0)          | 26(32.9)                      |         |
| ≥1%                                       | 62(48.4)    | 9(75.0)          | 53(36.7)                      |         |
| N.A.                                      | 55          | 6                | 49                            |         |
| TMB, median (mut/Mb)                      | 7.1         | 14.0             | 7.0                           | 0.002   |
| Treatment                                 |             |                  |                               | 0.006   |
| Monotherapy                               | 19(29.5)    | 6(33.3)          | 13(10.2)                      |         |
| Combinotherapy                            | 127(70.5)   | 12(66.7)         | 115(89.8)                     |         |
| Line                                      |             |                  |                               | 0.879   |
| First-line                                | 95(62.3)    | 12(66.7)         | 83(64.8)                      |         |
| ≥Second-line                              | 51(37.7)    | 6(33.3)          | 45(35.2)                      |         |

SWI/SNF, SWItch/Sucrose NonFermentable; Mut, mutation; Wt, wild type; N.A., not
available; Others*: adenosquamous carcinomas, sarcomatoid carcinoma, carcinoid, large cell carcinoma, high-grade neuroendocrine carcinoma and poorly-differentiated non-small cell lung carcinomas, not otherwise specified (NOS); PD-L1, programmed cell death-ligand 1; TMB, tumor mutational burden; Mut/Mb, mutations per megabase.