

Table SI. Relationships between pre- and post-<sup>M</sup>CTC status and clinicopathological parameters of CRC patients.

| Parameters      | Pre- <sup>M</sup> CTCs |          |          |                 |                     | Post- <sup>M</sup> CTCs |          |          |                 |                    |
|-----------------|------------------------|----------|----------|-----------------|---------------------|-------------------------|----------|----------|-----------------|--------------------|
|                 | n (%)                  | Negative | Positive | $\chi^2$ -value | P-value             | n (%)                   | Negative | Positive | $\chi^2$ -value | P-value            |
| Sex             |                        |          |          | 0.502           | 0.479               |                         |          |          | 2.246           | 0.134              |
| Male            | 114 (65.1)             | 68       | 46       |                 |                     | 77 (60.6)               | 56       | 21       |                 |                    |
| Female          | 61 (34.9)              | 33       | 28       |                 |                     | 50 (39.4)               | 30       | 20       |                 |                    |
| Age             |                        |          |          | 0.030           | 0.863               |                         |          |          | 0.347           | 0.556              |
| <60 years       | 77 (44.0)              | 45       | 32       |                 |                     | 48 (37.8)               | 31       | 17       |                 |                    |
| ≥60 years       | 98 (56.0)              | 56       | 42       |                 |                     | 79 (62.2)               | 55       | 24       |                 |                    |
| Tumor location  |                        |          |          | 2.257           | 0.133               |                         |          |          | 2.014           | 0.156              |
| Colon           | 92 (52.6)              | 58       | 34       |                 |                     | 58 (45.7)               | 43       | 15       |                 |                    |
| Rectal          | 83 (47.4)              | 43       | 40       |                 |                     | 69 (54.3)               | 43       | 26       |                 |                    |
| Tumor size      |                        |          |          | 2.628           | 0.105               |                         |          |          | 0.730           | 0.393              |
| <5 cm           | 69 (39.4)              | 45       | 24       |                 |                     | 47 (37.0)               | 34       | 13       |                 |                    |
| ≥5 cm           | 106 (60.6)             | 56       | 50       |                 |                     | 80 (63.0)               | 52       | 28       |                 |                    |
| Tumor grade     |                        |          |          | 6.897           | 0.009 <sup>a</sup>  |                         |          |          | 2.987           | 0.084              |
| Low             | 103 (58.9)             | 51       | 52       |                 |                     | 76 (59.8)               | 47       | 29       |                 |                    |
| Middle and High | 72 (41.1)              | 50       | 22       |                 |                     | 51 (40.2)               | 39       | 12       |                 |                    |
| LVI             |                        |          |          | 15.495          | <0.001 <sup>a</sup> |                         |          |          | 8.791           | 0.003 <sup>a</sup> |
| Absence         | 101 (57.7)             | 71       | 30       |                 |                     | 82 (64.6)               | 63       | 19       |                 |                    |
| Presence        | 74 (42.3)              | 30       | 44       |                 |                     | 45 (35.4)               | 23       | 22       |                 |                    |
| PNI             |                        |          |          | 3.423           | 0.064               |                         |          |          | 2.598           | 0.107              |
| Absence         | 113 (64.6)             | 71       | 42       |                 |                     | 86 (67.7)               | 64       | 24       |                 |                    |
| Presence        | 62 (35.4)              | 30       | 32       |                 |                     | 41 (32.3)               | 24       | 17       |                 |                    |
| Tumor invasion  |                        |          |          | 24.044          | <0.001 <sup>a</sup> |                         |          |          |                 |                    |
| T1-2            | 48 (27.4)              | 42       | 6        |                 |                     | 22 (17.3)               | 16       | 6        | 0.306           | 0.580              |
| T3-4            | 127 (72.6)             | 59       | 68       |                 |                     | 105 (82.7)              | 70       | 35       |                 |                    |
| LNM             |                        |          |          | 10.382          | 0.001 <sup>a</sup>  |                         |          |          | 4.517           | 0.034 <sup>a</sup> |
| N0-1            | 84 (48.0)              | 59       | 25       |                 |                     | 41 (32.3)               | 33       | 8        |                 |                    |
| N2-3            | 91 (52.0)              | 42       | 49       |                 |                     | 86 (67.7)               | 53       | 33       |                 |                    |
| TNM stage       |                        |          |          | 1.389           | 0.239               |                         |          |          | 0.660           | 0.417              |
| II              | 68 (38.9)              | 43       | 25       |                 |                     | 53 (41.7)               | 38       | 15       |                 |                    |
| III             | 107 (61.1)             | 58       | 49       |                 |                     | 74 (58.3)               | 48       | 26       |                 |                    |
| CEA level       |                        |          |          | 2.602           | 0.107               |                         |          |          | 2.788           | 0.095              |
| <5 ng/ml        | 127 (72.6)             | 78       | 49       |                 |                     | 87 (68.5)               | 63       | 24       |                 |                    |
| ≥5 ng/ml        | 48 (27.4)              | 23       | 25       |                 |                     | 40 (31.5)               | 23       | 17       |                 |                    |
| Overall         | 175 (100.0)            | 101      | 74       | -               | -                   | 127 (100.0)             | 86       | 41       | -               | -                  |

<sup>a</sup>P<0.05. CRC, colorectal cancer; <sup>M</sup>CTCs, mesenchymal circulating tumor cells; LVI, lymphovascular invasion; PNI, perineural invasion; LNM, lymph node metastasis; TNM, tumor-node-metastasis; CEA, carcinoembryonic antigen.