

Table S1. Demographic and clinicopathological features of 296 CRLM patients with different molecular characteristics.

	<i>POLE</i> EDM	MSI-H	<i>POLE</i> non-EDM	MSS
Total patients	4 (1.4%)	5 (1.7%)	11 (3.7%)	276 (93.2%)
Age (years)	36 (33-46)	42 (33-45)	52 (47-56)	57 (48-63)
Sex				
Male	4 (100.0%)	4 (80.0%)	7 (63.6%)	181 (65.6%)
Female	0 (0.0%)	1 (20.0%)	4 (36.4%)	95 (34.4%)
Primary tumor site				
Right	2 (50.0%)	1 (20.0%)	3 (27.3%)	66 (23.9%)
Left	1 (25.0%)	1 (20.0%)	4 (36.4%)	140 (50.7%)
Rectum	1 (25.0%)	3 (60.0%)	4 (36.4%)	70 (25.4%)
Grade				
G1-2	1 (25.0%)	4 (80.0%)	9 (81.8%)	219 (79.3%)
G3	3 (75.0%)	1 (20.0%)	2 (18.2%)	57 (20.7%)
Lymph node metastasis	4 (100.0%)	4 (80.0%)	10 (90.9%)	167 (60.5%)
Liver metastases				
Synchronous	4 (100.0%)	2 (40.0%)	11 (100.0%)	226 (81.9%)
Metachronous	0 (0.0%)	3 (60.0%)	0 (0.0%)	50 (18.1%)
No. of liver metastases	6 (4-7)	2 (1-2)	1 (1-6)	2 (1-4)
Diameter of largest LM (cm)	7.6 (4.0-7.2)	3.0 (1.5-9.5)	2.5 (1.0-7.2)	2.5 (0.3-9.5)
Clinical Risk Score (CRS)				
0-2	0 (0.0%)	1 (20.0%)	6 (54.5%)	161 (58.3%)
3-5	4 (100.0%)	4 (80.0%)	5 (45.5%)	115 (41.7%)
<i>POLE</i> mutation site	P286R	-	A25V, R222C, E584G, V835I, E1062K, Q1332R, R1508H, A1532T, K1550N, P1582S, V1887M	-
Tumor Mutation Burden	313.9 (294.2-353.8)	42.2 (34.5-72.0)	4.8 (2.9-6.7)	4.8 (1.9-6.7)

Data are n (%) or median (interquartile range, IQR). CRLM, colorectal cancer liver metastases; EDM, exonuclease domain mutation; LM, liver metastases; MSI-H, microsatellite instability-high; MSS, microsatellite stable; *POLE*, polymerase epsilon.