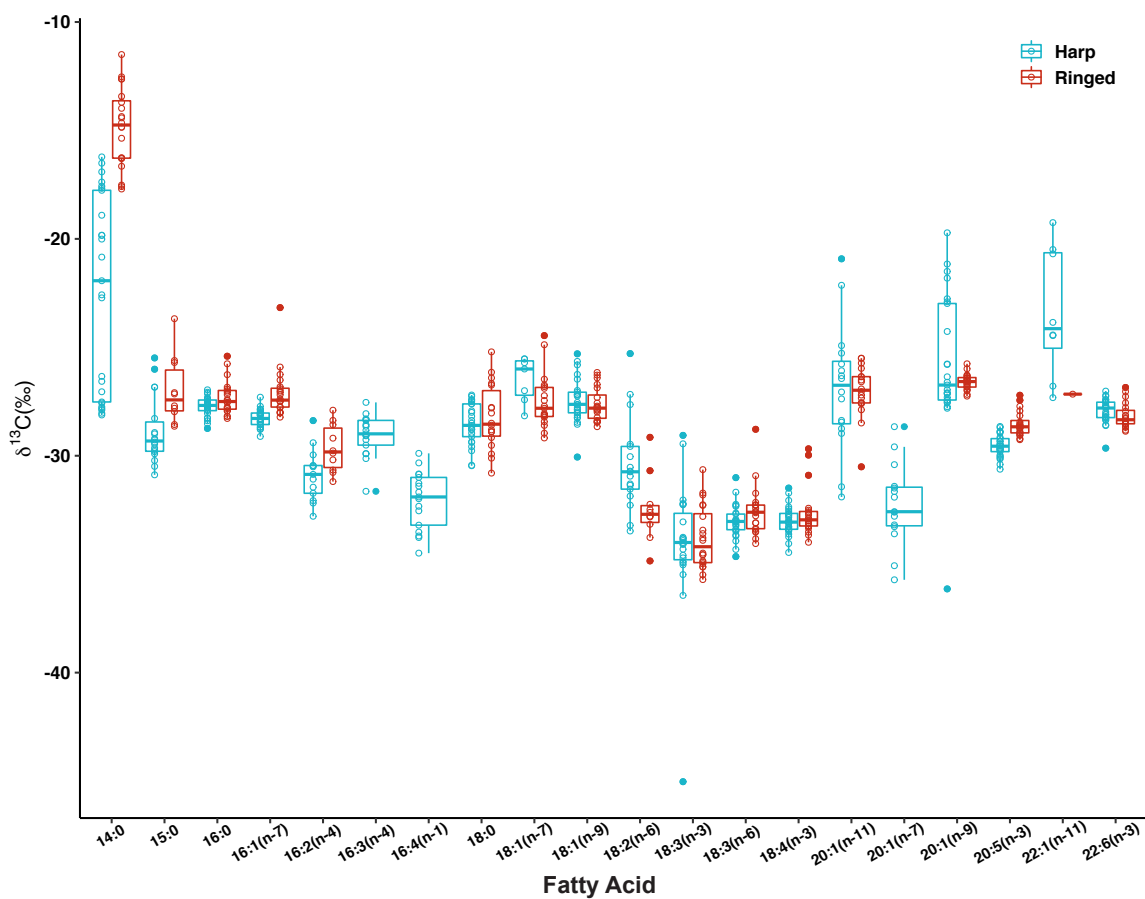


SUPPLEMENTARY MATERIAL

Table S1. Relative mean amounts of the fatty acids in iPOM, pPOM, harp seals and ringed seals in the study region (reported as % of sum \pm SD of total content). Asterisks denote marker fatty acids. Sums are reported for: saturated fatty acids (SFA), monounsaturated fatty acids (MUFA), polyunsaturated fatty acids (PUFA), bacterial fatty acids (odd chained branched fatty acids), and *Calanus* spp. fatty acids (20:1(n-9) and 22:1(n-11)). ND = not detected, NA = not applicable.

| Fatty Acid | iPOM 2017 | pPOM 2017 | Harp seals 2016 | Ringed seals 2017 |
|-------------|-------------------|------------------|-----------------|-------------------|
| | n = 11 (stations) | n = 7 (stations) | n = 25 | n = 20 |
| 14:0 | 9.2 \pm 3.9 | 6.5 \pm 3.3 | 5.2 \pm 0.5 | 3.3 \pm 0.3 |
| 14:1(n-5) | nd | 1.9 \pm 1.1 | nd | nd |
| i-15:0 | 0.5 \pm 0.06 | 2.3 \pm 1.6 | 0.3 \pm 0.1 | 0.4 \pm 0.1 |
| a-15:0 | 0.4 \pm 0.05 | 1.3 \pm 0.6 | 0.9 \pm 0.2 | 1.1 \pm 0.3 |
| 15:0 | 0.6 \pm 0.3 | 2.4 \pm 0.8 | 0.3 \pm 0.04 | 0.3 \pm 0.04 |
| 16:0 | 20.9 \pm 4.5 | 25.5 \pm 3.3 | 9.3 \pm 1.4 | 7.0 \pm 1.4 |
| 16:1(n-7) * | 34.1 \pm 11.1 | 16.5 \pm 12.0 | 15.8 \pm 2.5 | 14.5 \pm 1.6 |
| 16:1(n-5) | 1 \pm 1.1 | 1.7 \pm 0.1 | 0.3 \pm 0.03 | 0.4 \pm 0.03 |
| 16:2(n-4) | 2.4 \pm 1.7 | 2.6 \pm 0.9 | 0.7 \pm 0.1 | 0.5 \pm 0.2 |
| 16:3(n-4) | 1.7 \pm 1.2 | 1.9 \pm 0.6 | 0.4 \pm 0.1 | 0.4 \pm 0.1 |
| 16:4(n-1) | 2.8 \pm 1.5 | 7.2 \pm 6.3 | 0.3 \pm 0.1 | 0.2 \pm 0.02 |
| i-17:0 | 3 \pm 0.6 | nd | 0.1 \pm 0.01 | 0.2 \pm 0.02 |
| a-17:0 | nd | nd | 0.2 \pm 0.1 | 0.2 \pm 0.03 |
| 18:0 | 3.7 \pm 3 | 25.2 \pm 11.0 | 1.1 \pm 0.2 | 0.9 \pm 0.2 |
| 18:1(n-11) | 0.6 | nd | 2.4 \pm 0.6 | 4.0 \pm 0.5 |
| 18:1(n-9) | 6.3 \pm 4.6 | 4.5 \pm 1.7 | 19.2 \pm 2.2 | 16.9 \pm 2.3 |
| 18:1(n-7) | 1.7 \pm 2.1 | 2.4 \pm 1.5 | 4.8 \pm 0.8 | 3.5 \pm 0.4 |
| 18:1(n-5) | 6.4 | 5.7 | 0.5 \pm 0.1 | 0.6 \pm 0.1 |
| 18:2(n-6) | 2.3 \pm 1.7 | 3.5 \pm 1.7 | 2.0 \pm 0.3 | 1.6 \pm 0.2 |
| 18:3(n-3) | 1.2 \pm 0.6 | 1.6 \pm 0.4 | 0.9 \pm 0.2 | 1.1 \pm 0.2 |
| 18:3(n-6) | 0.9 \pm 0.4 | nd | 0.2 \pm 0.02 | nd |
| 18:4(n-3) * | 2.7 \pm 1.1 | 4.1 \pm 0.8 | 2.8 \pm 0.7 | 2.2 \pm 0.3 |
| 20:0 | 0.5 | nd | nd | nd |
| 20:1(n-11) | 0.4 \pm 0.1 | 0.3 | 1.4 \pm 0.4 | 1.6 \pm 0.2 |
| 20:1(n-9) | 2.1 \pm 1.2 | 5.6 \pm 1.9 | 7.7 \pm 2.3 | 12.3 \pm 2.0 |
| 20:1(n-7) | 2.2 | 0.5 | 0.3 \pm 0.1 | 0.3 \pm 0.1 |
| 20:2(n-6) | nd | nd | 0.3 \pm 0.1 | 0.3 \pm 0.02 |
| 20:3(n-6) | nd | nd | 0.2 \pm 0.1 | 0.4 \pm 0.04 |
| 20:4(n-3) | 0.6 \pm 0.5 | nd | 0.6 \pm 0.1 | 0.6 \pm 0.04 |
| 20:4(n-6) | 0.8 \pm 0.5 | nd | 0.4 \pm 0.1 | 0.4 \pm 0.1 |
| 20:5(n-3) * | 11.0 \pm 5.3 | 4.1 \pm 1.8 | 7.5 \pm 0.9 | 6.7 \pm 0.8 |

| | | | | |
|-----------------------|------------|-----------|-----------|------------|
| 22:0 | 0.7 | nd | nd | nd |
| 22:1(n-11) | nd | nd | 2.7 ± 1.5 | 2.8 ± 1.1 |
| 22:1(n-9) | 1.9 ± 2.2 | nd | 0.5 ± 0.2 | 0.6 ± 0.3 |
| 22:5(n-3) | 0.4 ± 0.04 | 2.2 | 3.4 ± 0.4 | 4.3 ± 0.5 |
| 22:6(n-3) * | 2 ± 1.2 | 4.0 ± 1.2 | 8.1 ± 1.3 | 11.4 ± 0.8 |
| 24:1(n-9) | nd | nd | 0.2 | nd |
| SFA | 39.5 | 63.2 | 17.4 | 13.3 |
| MUFA | 56.7 | 39.1 | 55.7 | 57.5 |
| PUFA | 28.8 | 31.2 | 27.7 | 29.9 |
| Σ Bacteria | 4.6 | 6.0 | 1.8 | 2.1 |
| Σ <i>Calanus</i> spp. | na | na | 10.4 | 15.1 |



$^{13}\text{C}_{\text{FA}}$ values (‰) in harp seals (2016) and ringed seals (2017) from the study region.