Supplemental Data

Suppl. Table 1) Number of total and valid recordings included in further analyses

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
|  |  | **T0** | **T1** | **T2** | **T3**  |
| **Patient** |  | Total/Valid | Total/Valid | Total/Valid | Total/Valid |
| **1** | AVAGlycocheck | 3/32/2 | 2/21/1 | 1/11/1 | 1/1n.a. |
| **2** | AVAGlycocheck | 3/32/2 | 2/23/3 | n.a.1/1 | n.a.n.a. |
| **3** | AVAGlycocheck | 2/22/2 | 2/22/2 | 3/33/3 | 1/11/1 |
| **4** | AVAGlycocheck | 3/33/3 | 4/23/3 | n.a.n.a. | n.a.n.a. |
| **5** | AVAGlycocheck | 4/33/3 | 4/22/2 | 4/33/3 | 6/43/3 |
| **6** | AVAGlycocheck | 3/22/2 | 2/22/2 | 2/1n.a. | n.a.n.a. |
| **7** | AVAGlycocheck | 4/23/3 | 3/23/3 | n.a.n.a. | n.a.n.a. |
| **8** | AVAGlycocheck | 4/33/3 | 2/23/3 | n.a.n.a. | n.a.n.a. |
| **9** | AVAGlycocheck | 3/23/3 | 3/33/3 | 3/31/1 | 3/23/3 |
| **10** | AVAGlycocheck | 4/13/3 | 3/13/3 | n.a.n.a. | n.a.n.a. |
| **11** | AVAGlycocheck | 3/33/3 | 3/23/3 | 3/33/3 | n.a.n.a. |

n.a. = not assessed due to missing cooperation, agitation and/or respiratory instability

Suppl. Table 2) Intraoperative fluid-and volume replacement therapy

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| **Patient** | **Crystalloids (ml/kg/h)** | **Volume replacement therapy****(ml/kg/h)** | **Colloids** **(ml/kg bw)** | **Blood products (ml/kg bw)**  | **Blood loss** **(ml/kg bw)** |
| **1** | 35 | 20 | 44 | 165 | 96 |
| **2** | 8 | 5 | 7 | 38 | 18 |
| **3** | 12 | 4 | 9 | 26 | 16 |
| **4** | 18 | 8 | 30 | 20 | 10 |
| **5** | 14 | 13 | 23 | 105 | 105 |
| **6** | 16 | 2 | 13 | 0 | 11 |
| **7** | 27 | 4 | 0 | 15 | 9 |
| **8** | 13 | 2 | 13 | 0 | 9 |
| **9** | 25 | 17 | 34 | 77 | 17 |
| **10** | 17 | 0 | 0 | 0 | 6 |
| **11** | 33 | 6 | 33 | 14 | 19 |

Suppl. Table 3: Laboratory data

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
|  |  | **T0** | **T1** | **p-value** |
| **Hemoglobin** | g/dl | 10.3±2 | 10.4±1 | 0.936 |
| **Hematocrit** | % | 29.8±5.7 | 30.7±3.7 | 0.651 |
| **Platelets** | G/l | 345±141 | 265±105 | 0.045 |
| **Leukocytes** | G/l | 6.5±3.5 | 9.6±7.8 | 0.180 |
| **Lactate** | mmol/l | 0.8±0.3 | 1.8±1.3 | 0.006 |
| **Creatinine** | mg/dl | 0.3±0.1 | 0.5±0.3 | 0.023 |
| **CrP** | mg/dl | 2.2±3.4 | 1.6±2.1 | 0.16 |
| **Serum protein** | g/dl | 6.3±1.6 | 4.7±0.9 | 0.0003 |
| **Glucose** | mg/dl | 89±9 | 87±28 | 0.885 |



Supplemental Figure 1: Subgroup analysis of patients with recordings available at timepoints T0 to T3 (n = 4). Changes in TVD (A), MFI (B) and vessel diameter distribution (C) are depicted.