**Supplementary Table 7**

**Limitations of studies supportive or cardio-cerebral coupling**

*CBF, cerebral blood flow; MAP, mean arterial pressure; TCD, transcranial Doppler*

|  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- |
| **Author (Year) [Reference #]** | **PCO2 not measured** | **Concurrent changes in PCO2** | **MAP not measured** | **Concurrent changes in MAP** | **TCD or non-conventional measurement of CBF** | **Potential for direct effect on the cerebral circulation from intervention** | **Association only seen in regions with impaired autoregulation** |
| Shapiro (1969) [67] |  |  |  |  | X |  |  |
| Soma (1989) [63] | X |  |  |  |  |  |  |
| Ozdemir (2012) [51] | X |  |  |  | X |  |  |
| Sato (2011) [50] | X |  |  | X | X |  |  |
| Seifert (2009) [35] |  | X |  | X | X |  |  |
| Van Lieshout (2001) [36] |  | X |  | X | X |  |  |
| Ide (1999) [37] | X |  |  | X | X |  |  |
| Ide (1998) [38] |  | X |  | X | X |  |  |
| Fraser (2012) [52] | X |  |  |  | X |  |  |
| Bronzwaer (2017)[30] | X |  |  | X | X |  |  |
| Deegan (2010) [31] | X |  |  | X | X |  |  |
| Levine (1994) [38] | X |  |  |  | X |  |  |
| Brown (2003) [39] | X |  |  |  | X |  |  |
| Ogawa (2007) [41] | X |  |  |  | X |  |  |
| Diamant (2002) [32] | X |  | X |  | X |  |  |
| Keller (1982) [55] | X |  |  |  |  |  | X |
| Tu (1996) [57] | X |  |  |  |  |  |  |
| Tranmer (1992) [59] |  |  |  | X |  | X | X |
| \*Wood (1984) [60] |  |  |  |  |  |  |  |
| Ogawa (2007) [41] | X |  |  |  | X |  |  |
| Sato (2000) [49] | X |  |  | X |  | X |  |
| Bouma (1990) [53] | X |  |  | X |  | X | X |
| Davis (1980) [54] | X |  |  | X |  | X |  |
| Ha (2016) [33] | X |  | X |  | X | X |  |
| Kim (2003) [58] | X |  |  | X |  | X |  |
| Levy (1993) [34] | X |  |  | X | X | X |  |
| Treib (1996) [43] | X |  |  | X | X | X | X |
| Berre (1994) [45] |  |  |  | X | X | X |  |
| Berre (1997) [44] |  |  |  | X | X | X |  |
| Larsen (2000) [46] | X |  |  | X | X | X |  |

**\***Wood (1984) is included, although the changes in CBF did not reach statistical significance