**Supplementary Table 1.** Summary of ARSA dimensions systematic review.

|  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| **Study [Ref]** | **Cases** | **Cadaverdemographics (sex, age, ethnicity)** | **ARSA Diameter [mm]** | **ARSA Area [mm2]** | **ARSA perimeter [mm]** | **LSA comparison** | **Origin location** | **Course** | **Other aortic arch anomalies present** |
| Present study | 1 | Female, 83, Caucasian | 3.68 | 8.2 | 10.16 | LSA diameter 15.45 mm,  LSA Area 152.5 mm2 | Descending Aorta — T5 | Retro–oesophageal | None |
| Alghamdi et al., 2020, Saudi Arabia [1] | 1 | Female, unknown, unspecified | 16 | – | – | LSA diameter 9 mm | Aortic arch | Retro-oesophageal | KD |
| Almenar-García et al., 2002, Spain [2] | 1 | Male, 82, unspecified | 12 | – | – | NA | Aortic arch — T3 | Retro-oesophageal | NS |
| Buffoli et al., 2021, Italy[6] | 1 | Female, unspecified, Caucasian | 9.2 | – | – | LSA diameter 6.8 mm | Aortic arch | Retro-oesophageal | BCT, ectopic vertebral artery origin |
| Esumi et al., 2023, Japan [13] | 1 | Male, 62, Japanese | 20 | – | – | LSA diameter 10 mm | Aortic arch — T3 | Retro-oesophageal | NS |
| Fazan et al., 2003, Brazil [14] | 1 | Female, 54, Caucasian | 16 | – | – | LSA diameter 12 mm | Aortic arch | Retro-oesophageal | NS |
| Kaidoh et al., 2011, Japan [20] | 1 | Female, 75, Japanese | 8 | – | – | NA | Aortic arch — T3 (3 cm below the origin of the LSA) | Retro-oesophageal | KD |
| Makgalwa et al., 2007, South Africa [28] | 1 | Female, 44, black | 17.3 | – | – | LSA diameter 13.8 mm | Aortic arch (3 mm distal to LSA) | Retro-oesophageal | NS |
| Mirande et al., 2020, United States [29] | 2 | Male, 63, Caucasian | – | 482.7 | – | LSA area 142.3 mm2 | Aortic arch | Retro-oesophageal | NS |
| Female, 73, Caucasian | – | 305.7 | – | LSA area 78.17 mm2 | Aortic arch (posterior surface) | Retro-oesophageal | NS |
| Namking et al., 2009, Thailand [31] | 1 | Female, 80, unspecified | 15.4 | – | – | LSA diameter 8.7 mm | Aortic arch (crosses midline at T3) | Retro-oesophageal | NS |
| Natsis et al., 2011, Greece [35] | 2 | Male, 76, Caucasian | 12 | – | – | NA | Aortic arch — T4 | Retro-tracheal | BCT |
| Male, 81, Caucasian | 16 | – | – | NA | Aortic arch — T3 | Retro–oesophageal | BCT |
| Ostrowski et al., 2022, Poland [36] | 1 | Male, 63, Unspecified | 12.9 | – | – | LSA diameter 8.3 mm | Aortic arch | Retro-oesophageal | NS |
| Peña et al., 2013, Columbia [37] | 1 | Male, unspecified, Columbian | – | – | 68 | NA | Aortic arch | Retro-oesophageal | NS |
| Qui et al., 2019, China [40] | 5 | Female, unspecified, unspecified | 8.42 | – | – | NA | Aortic arch | Retro-oesophageal | NS |
| Male, unspecified, unspecified | 5.87 | – | – | NA | Aortic arch | Retro-oesophageal | NS |
| Male, unspecified, unspecified | 10.31 | – | – | NA | Aortic arch | Retro-oesophageal | NS |
| Male, unspecified, unspecified | 9.98 | – | – | NA | Aortic arch | Retro-oesophageal | NS |
| Male, unspecified, unspecified | 1.91 | – | – | LSA diameter 1.68 | Aortic arch | Retro-oesophageal | BCT |
| Sakuma et al., 2005, Japan [41] | 1 | Female, unspecified, unspecified | 17.2 | – | – | LSA diameter 10.7 mm | Aortic arch — T4 | Retro-oesophageal | KD |
| Sangam et al., 2010, India [42] | 1 | Male, unspecified, unspecified | 12 | – | – | LSA diameter 8 mm | Aortic arch (1.4 cm distal to origin of LSA) | Retro-oesophageal | BCT |
| Suriyonplengsaeng et al., 2014, Thailand [44] | 1 | Male, 81, Thai | 12 | – | – | NA | Descending Aorta — T4 | Retro-oesophageal | NS |

ARSA — aberrant right subclavian artery; BCT — bicarotid trunk; KD — Kommerell’s diverticulum; LSA — left subclavian artery; NA — not available; NS — not specified.