Supplementary Table 1: Newcastle-Ottowa Scale for Qualitative Analysis

|  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- |
| **Author** | **Selection** | | | | **Comparability** | **Outcomes** | | |
|  | Representation of patients with ASD | Selection of patients with ASD | Ascertainment of exposure to either treatment option | Demonstration that outcome of interest was present at start of study | Reporting of transcatheter intervention  Reporting of surgical intervention | Assessment of outcomes | Follow-up long enough for outcomes to occur | Adequacy reporting of outcomes |
| Bettencourt N (2003) | **\*** | **\*** | **\*** |  | **\***  **\*** | **\*** | **\*** | **\*** |
| Boudiche S  (2019) | **\*** | **\*** | **\*** | **\*** | **\***  **\*** | **\*** | **\*** | **\*** |
| Bialkowski J  (2004) | **\*** | **\*** | **\*** |  | **\***  **\*** | **\*** | **\*** | **\*** |
| Butera G (B)  (2006) | **\*** | **\*** | **\*** | **\*** | **\***  **\*** | **\*** |  | **\*** |
| Bove T  (2005) |  | **\*** | **\*** |  | **\***  **\*** | **\*** | **\*** | **\*** |
| Tanghoj G  (2019) |  | **\*** |  |  | **\***  **\*** | **\*** | **\*** |  |
| Sun KP  (2020) | **\*** | **\*** | **\*** |  | **\***  **\*** | **\*** | **\*** | **\*** |
| Fujii Y  (2020) | **\*** | **\*** | **\*** |  | **\***  **\*** | **\*** | **\*** | **\*** |
| Chen TH  (2015) | **\*** | **\*** | **\*** | **\*** | **\***  **\*** | **\*** | **\*** | **\*** |
| Bolcal C  (2017) | **\*** | **\*** | **\*** | **\*** | **\***  **\*** | **\*** | **\*** | **\*** |
| Rudzîtis A  (2017) | **\*** | **\*** | **\*** | **\*** | **\***  **\*** | **\*** | **\*** |  |
| Siddiqui WT  (2014) | **\*** | **\*** | **\*** | **\*** | **\***  **\*** | **\*** | **\*** | **\*** |
| Schneeberger Y (2017) | **\*** | **\*** | **\*** |  | **\***  **\*** | **\*** | **\*** | **\*** |
| Durongpisitkul K  (2002) | **\*** | **\*** | **\*** | \* | **\***  **\*** | **\*** | **\*** | **\*** |
| Quek SC  (2010) | **\*** | **\*** | **\*** | **\*** | **\***  **\*** | **\*** |  | **\*** |
| Kodaira M  (2017) | \* | \* | \* | \* | \*  \* | \* |  | \* |
| Castaldi B  (2015) | \* | \* | \* | \* | \*  \* | \* | \* | \* |
| Bakar SN  (2018) |  | **\*** | **\*** | **\*** | **\***  **\*** | **\*** | **\*** | **\*** |
| Rosas M  (2007) | **\*** | **\*** | **\*** | **\*** | **\***  **\*** | **\*** | **\*** | **\*** |
| Mojadidi MK  (2019) | \* | **\*** | **\*** | **\*** | **\***  **\*** | **\*** | \* | **\*** |
| Kotowycz MA  (2013) | **\*** | **\*** | **\*** | **\*** | **\***  **\*** | **\*** | **\*** | **\*** |
| Thomson JDR  (2002) | **\*** | **\*** | **\*** | **\*** | **\***  **\*** | **\*** | **\*** | **\*** |
| Hughes ML  (2002) | **\*** | **\*** | **\*** |  | **\***  **\*** | **\*** |  | **\*** |
| Askari B  (2018) | **\*** | **\*** | **\*** |  | **\***  **\*** | **\*** |  | **\*** |
| Formigari R  (2001) | **\*** | **\*** | **\*** | **\*** | **\***  **\*** | **\*** | **\*** | **\*** |
| Qi H  (2020) | **\*** | **\*** | **\*** | **\*** | **\***  **\*** | **\*** | **\*** | **\*** |
| Butera G (A)  (2005) | **\*** | **\*** | **\*** | **\*** | **\*** | **\*** | **\*** | **\*** |
| Jones TK  (2007) | **\*** | **\*** | **\*** | **\*** | **\***  **\*** | **\*** | **\*** | **\*** |
| Qiu HF  (2019) | **\*** | **\*** | **\*** |  | **\***  **\*** | **\*** | **\*** | **\*** |
| Suchon E  (2009) | **\*** | **\*** | **\*** |  | **\***  **\*** | **\*** | **\*** | **\*** |
| Ananthakrishna Pillai A  (2019) | **\*** | **\*** | **\*** | **\*** | **\***  **\*** | **\*** | **\*** | **\*** |
| Kadirogullari E  (2020) | **\*** | **\*** | **\*** | **\*** | **\***  **\*** |  | **\*** |  |
| Ooi YK  (2016) | **\*** | **\*** | **\*** | **\*** | **\***  **\*** | **\*** | **\*** | **\*** |
|  | | | | | | | | |