

## **Supplementary file 1: Details of search line for each database**

### **PubMed:**

("Polycystic Ovary Syndrome"[Mesh] OR "PCOS" OR "Polycystic Ovarian Syndrome" OR "Stein Leventhal Syndrome" OR "Stein-Leventhal Syndrome" OR "Polycystic Ovar\*") AND ("Metformin"[Mesh] OR Metformin)

*With the Clinical Trial filter, 505 records were found.*

### **Scopus:**

("Polycystic Ovary Syndrome" OR "PCOS" OR "Polycystic Ovarian Syndrome" OR "Stein Leventhal Syndrome" OR "Stein-Leventhal Syndrome" OR "Polycystic Ovar\*") AND (Metformin) AND ("clinical trial" OR "randomized clinical trial" OR "RCT" OR "trial")

*With the title/abstract and keyword filter 1445 records were found.*

### **Embase:**

('Polycystic Ovary Syndrome' OR 'PCOS' OR 'Polycystic Ovarian Syndrome' OR 'Stein Leventhal Syndrome' OR 'Stein-Leventhal Syndrome' OR 'Polycystic Ovar\*') AND (Metformin)

*With the Controlled Clinical Trial filter, 797 records were found.*

### **Web of Science:**

("Polycystic Ovary Syndrome" OR "PCOS" OR "Polycystic Ovarian Syndrome" OR "Stein Leventhal Syndrome" OR "Stein-Leventhal Syndrome" OR "Polycystic Ovar\*") AND (Metformin) AND ("clinical trial" OR "randomized clinical trial" OR "RCT" OR "trial")

*With the topic filter (title/abstract and keyword) 741 records were found.*