**Detailed search strategy for each database**

**Pubmed104**

#1Mobile Applications[MeSH Terms]

#2mHealth applications[Title/Abstract] OR mHealth[Title/Abstract] OR portable software application[Title/Abstract] OR app[Title/Abstract] OR apps[Title/Abstract] OR app-based[Title/Abstract]

#3 #1 OR #2

#4Neoplasms[MeSH Terms]

#5cancer[Title/Abstract]OR tumor[Title/Abstract] OR neoplasia[Title/Abstract]

#6 #4 OR #5

#7Postoperative Period[MeSH Terms]

#8surgery[Title/Abstract] OR surg\*[Title/Abstract] OR surgical procedures[Title/Abstract]

#9 #7 OR #8

#10randomized controlled trial OR controlled clinical trial OR randomized OR placebo OR clinical trials as topic OR randomly OR trial

#11 #3 AND #6 AND #9 AND #10

**Cochrane Central Register of Controlled Trials (CENTRAL)167**

#1Mobile Applications

#2(mHealth applications):ab,ti,kw OR (mHealth):ab,ti,kw OR (portable software application):ab,ti,kw OR (app):ab,ti,kw OR (apps):ab,ti,kw OR (app-based):ab,ti,kw

#3 #1 OR #2

#4Neoplasms

#5(cancer):ab,ti,kw OR (tumor):ab,ti,kw OR (neoplasia):ab,ti,kw

#6 #4 OR #5

#7Postoperative Period

#8(surgery):ab,ti,kw OR (surg\*):ab,ti,kw OR (surgical procedures):ab,ti,kw

#9 #7 OR #8

#10(randomized controlled trial):ab,ti,kw OR (controlled clinical trial):ab,ti,kw OR (randomized):ab,ti,kw OR (placebo):ab,ti,kw OR (randomly):ab,ti,kw OR (trial):ab,ti,kw OR (RCT):ab,ti,kw

#11 #3 AND #6 AND #9 AND #10

**CINAHL;MEDLINE (EBSCO)51**

#1AB ( Mobile Applications OR mHealth OR portable software application OR app OR apps OR app-based )OR TI ( Mobile Applications OR mHealth OR portable software application OR app OR apps OR app-based )

#2AB ( Neoplasms OR cancer OR tumor OR neoplasms OR neoplasia ) OR TI( Neoplasms OR cancer OR tumor OR neoplasms OR neoplasia )

#3AB ( Postoperative Period OR surgery OR surg\* OR surgical procedures ) OR TI ( Postoperative Period OR surgery OR surg\* OR surgical procedures )

#4AB ( randomized controlled trial OR controlled clinical trial OR randomized OR placebo OR clinical trials as topic OR randomly OR trial ) OR TI( randomized controlled trial OR controlled clinical trial OR randomized OR placebo OR clinical trials as topic OR randomly OR trial )

#5 #1 AND #2 AND #3 AND #4

**Web of Science114**

#1TS=(Mobile Applications OR mHealth applications OR mHealth OR portable software application OR app OR apps OR app-based)

#2TS=(Neoplasms OR cancer OR tumor OR neoplasia)

#3TS=(Postoperative Period OR surgery OR surg\* OR surgical procedures)

#4TS=(Randomized Controlled Trials as Topic OR Clinical Trials as Topic OR randomized controlled trial OR controlled clinical trial OR randomized OR placebo OR clinical trials as topic OR randomly OR trial)

#5#1 AND #2 AND #3 AND #4

**Embase24**

#1"mobile application"/exp

#2"mobile applications":ab,ti OR"application, mobile":ab,ti OR"applications, mobile":ab,ti OR"mobile application":ab,ti OR"mobile apps":ab,ti OR"app, mobile":ab,ti OR "apps, mobile":ab,ti OR"mobile app":ab,ti OR"portable software apps":ab,ti OR "app, portable software":ab,ti OR"portable software app":ab,ti OR"software app, portable":ab,ti OR "portable software applications":ab,ti OR"application, portable software":ab,ti OR"portable software application":ab,ti OR"software application, portable":ab,ti OR"smartphone apps":ab,ti OR"app, smartphone":ab,ti OR"apps, smartphone":ab,ti OR"smartphone app":ab,ti OR"portable electronic apps":ab,ti OR "app, portable electronic":ab,ti OR"electronic app, portable":ab,ti OR "portable electronic app":ab,ti OR"portable electronic applications":ab,ti OR"application, portable electronic":ab,ti OR"electronic application, portable":ab,ti OR"App-based":ab,ti

#3#1 OR #2

#4"neoplasms"/exp

#5"tumor":ab,ti OR "neoplasm":ab,ti OR "tumors":ab,ti OR "neoplasia":ab,ti OR "neoplasias":ab,ti OR "cancer":ab,ti OR "cancers" OR"malignant neoplasm":ab,ti OR"malignancy":ab,ti OR"malignancies" OR"malignant neoplasms" OR"neoplasm, malignant" OR"neoplasms, malignant" OR"benign neoplasms" OR"benign neoplasm" OR"neoplasms, benign" OR"neoplasm, benign"

#6#4 OR #5

#7"postoperative period"/exp

#8"period, postoperative":ab,ti OR"periods, postoperative":ab,ti OR"postoperative periods":ab,ti

#9#7 OR #8

#10"randomized controlled trial":ab,ti OR rct:ab,ti OR "quasi experiment":ab,ti OR trial:ab,ti OR intervention:ab,ti OR "randomized clinical trial" :ab,ti OR "controlled clinical trial ":ab,ti

#11 #3 AND #6 AND #9 AND #10

**Scopus271**

#1( TITLE-ABS-KEY ( "neoplasms" OR "cancer" OR "tumor" OR "neoplasia" ) )

#2( TITLE-ABS-KEY ( "randomized controlled trials as topic" OR "clinical trials as topic" OR "randomized controlled trial" OR "controlled clinical trial" OR "randomized" OR "placebo" OR "clinical trials as topic" OR "randomly" OR "trial" ) )

#3( TITLE-ABS-KEY ( "postoperative" OR "period" OR "surgery" OR "surg\*" OR "surgical procedures" ) )

#4( TITLE-ABS-KEY ( "mobile applications" OR "mhealth applications" OR "mhealth" OR "portable software application " OR "app" OR "apps" OR "app-based" ) )

#1 AND #2 AND #3 AND #4