

## Appendices

### Searched Databases:

- Embase: embase 1980 to april 2015 week 15.
- Medline: 1946 to april 2015 week 2.
- Psycinfo: 1806 to April Week 2 2015.
- Web of science searched 22<sup>nd</sup> April 2015.
- Cochrane Database of Systematic Reviews : Issue 4 of 12, April 2015
- Cochrane Central Register of Controlled Trials : Issue 3 of 12, March 2015

### Appendix 1. MEDLINE (Ovid) search strategy:

1. cellular phone/
2. ((cell\* or mobile or wireless) adj (phone\* or telephon\*)).tw.
3. (cellphone\* or mobiles or mhealth or m-health).tw.
4. ((mobile or handheld or hand-held) adj2 (device\* or technolog\* or app\* or health\*)).tw.
5. (smart phone\* or smartphone\* or blackberry or iphone\* or android phone\* or google android or ipod touch or personal digital assistant\* or pda or pdas).tw.
6. 1 or 2 or 3 or 4 or 5
7. (text\* or messag\* or multimedia or multi-media or imag\* or mms or data or input\* or application\* or app?).tw.
8. 6 and 7
9. text messaging/
10. ((text or short or multimedia or multi-media) adj1 messag\*).tw.
11. sms.tw.
12. (texting\* or texted or texter\*).tw.
13. (mms and (multimedia or multi-media or messag\*)).mp.
14. Electronic mail/
15. (electronic adj3 mail\$).ab,ti.
16. (electronic adj3 messag\$).ab,ti.
17. (email\$ or e-mail\$).ab,ti.
18. (noti\* adj6 (patient\* or client\* or service-user\* or people)).ti,ab,kw.
19. ((remind\* or alert\* or return\* or fail\*) adj2 (patient\* or client\* or service-user\* or people)).tw.
20. ((appointment\* or attend\* or arriv\* or consul\*) adj2 (patient\* or client\* or service-user\* or people)).tw.
21. (non?attend or non attend\* or no show).ti,ab,kw.
22. ((appointment\* or attend\*) adj6 (complicance or fail\* or keep\* or miss\* or prompt\*)).ti,ab,kw.
23. exp Reminder Systems/
24. exp "Appointments and Schedules"/
25. exp Patient Compliance/
26. Outpatients/
27. Outpatient Clinics, Hospital/ut [Utilization]
28. Case Management/
29. Office Visits/
30. 8 or 9 or 10 or 11 or 12 or 13 or 14 or 15 or 16 or 17 or 18
31. 19 or 20 or 21 or 22 or 23 or 24 or 25 or 26 or 27 or 28 or 29
32. 30 and 31
33. exp animals/ not humans.sh.
34. 32 not 33
35. limit 34 to yr="1993 -Current"

### Appendix 2. EMBASE (Ovid) search strategy:

1. mobile phone/
2. ((cell\* or mobile or wireless) adj (phone\* or telephon\*)).ti,ab,kw.
3. (cellphone\* or mobiles or mhealth or m-health).ti,ab,kw.
4. ((mobile or handheld or hand-held) adj2 (device\* or technolog\* or app\* or health\*)).ti,ab,kw.
5. personal digital assistant/
6. (smart phone\* or smartphone\* or blackberry or iphone\* or android phone\* or google android or ipod touch or personal digital assistant\* or pda or pdas).ti,ab,kw.
7. 1 or 2 or 3 or 4 or 5 or 6
8. (text\* or messag\* or multimedia or multi-media or imag\* or mms or data or input\* or application\* or app?).ti,ab,kw.
9. 7 and 8
10. text messaging/
11. ((text or short or multimedia or multi-media) adj1 messag\*).ti,ab,kw.
12. sms.ti,ab,kw.
13. (texting\* or texted or texter\*).ti,ab,kw.
14. (mms and (multimedia or multi-media or messag\*)).ti,ab,kw.
15. e-mail/
16. (electronic adj3 mail\$).ti,ab,kw.
17. (electronic adj3 messag\$).ti,ab,kw.
18. (email\$ or e-mail\$).ti,ab,kw.
19. (noti\* adj6 (patient\* or client\* or service-user\* or people)).ti,ab,kw.
20. 9 or 10 or 11 or 12 or 13 or 14 or 15 or 16 or 17 or 18 or 19
21. exp reminder system/
22. hospital management/
23. exp patient compliance/
24. exp outpatient care/
25. ((remind\* or alert\* or return\* or fail\*) adj2 (patient\* or client\* or service-user\* or people)).ti,ab,kw.
26. ((appointment\* or attend\* or arriv\* or consul\*) adj2 (patient\* or client\* or service-user\* or people)).ti,ab,kw.
27. (non?attend or non attend\* or no show).ti,ab,kw.
28. ((appointment\* or attend\*) adj6 (complacance or fail\* or keep\* or miss\* or prompt\*)).ti,ab,kw.
29. 21 or 22 or 23 or 24 or 25 or 26 or 27 or 28
30. 20 and 29

### **Appendix 3. PsycINFO (Ovid) search strategy:**

1. Cellular Phones/
2. ((cell\* or mobile or wireless) adj (phone\* or telephon\*)).ti,ab,id.
3. (cellphone\* or mobiles or mhealth or m-health).ti,ab,id.
4. ((mobile or handheld or hand-held) adj2 (device\* or technolog\* or app\* or health\*)).ti,ab,id.
5. Mobile Devices/
6. (smart phone\* or smartphone\* or blackberry or iphone\* or android phone\* or google android or ipod touch or personal digital assistant\* or pda or pdas).ti,ab,id.
7. 1 or 2 or 3 or 4 or 5 or 6
8. (text\* or messag\* or multimedia or multi-media or imag\* or mms or data or input\* or application\* or app?).ti,ab,id.
9. 7 and 8
10. electronic communication/
11. ((text or short or multimedia or multi-media) adj1 messag\*).ti,ab,id.
12. sms.ti,ab,id.
13. (texting\* or texted or texter\*).ti,ab,id.

14. (mms and (multimedia or multi-media or messag\*)).ti,ab,id.
15. exp computer mediated communication/
16. (electronic adj3 mail\$).ti,ab,id.
17. (electronic adj3 messag\$).ti,ab,id.
18. (email\$ or e-mail\$).ti,ab,id.
19. (noti\* adj6 (patient\* or client\* or service-user\* or people)).ti,ab,id.
20. 9 or 10 or 11 or 12 or 13 or 14 or 15 or 16 or 17 or 18 or 19
21. exp treatment compliance/
22. exp outpatient treatment/
23. treatment dropouts/
24. exp client attitudes/
25. ((remind\* or alert\* or return\* or fail\*) adj2 (patient\* or client\* or service-user\* or people)).ti,ab,id.
26. ((appointment\* or attend\* or arriv\* or consul\*) adj2 (patient\* or client\* or service-user\* or people)).ti,ab,id.
27. (non?attend or non attend\*).ti,ab,id.
28. ((appointment\* or attend\*) adj6 (complicance or fail\* or keep\* or miss\* or prompt\*)).ti,ab,id.
29. 21 or 22 or 23 or 24 or 25 or 26 or 27 or 28
30. 20 and 29

#### **Appendix 4. WEB of Science search strategy:**

1. TS=((cell\* or mobile or wireless) NEAR/1 (phone\* or telephon\*))
2. TS=(cellphone\* or mobiles or mhealth or m-health)
3. TS=((mobile or handheld or hand-held) NEAR/2 (device\* or technolog\* or app\* or health\*))
4. TS=(smart phone\* or smartphone\* or blackberry or iphone\* or android phone\* or google android or ipod touch or personal digital assistant\* or pda or pdas)
5. #4 OR #3 OR #2 OR #1
6. TS=(text\* or messag\* or multimedia or multi-media or imag\* or mms or data or input\* or application\* or app?)
7. #6 AND #5
8. TS=((text or short or multimedia or multi-media) NEAR/1 messag\*)
9. TS=(texting\* or texted or texter\* or sms)
10. TS=(mms and (multimedia or multi-media or messag\*))
11. TS=(electronic NEAR/3 mail\$)
12. TS=(electronic NEAR/3 messag\$)
13. TS=(email\$ or e-mail\$)
14. TS=(noti\* NEAR/6 (patient\* or client\* or service-user\* or people))
15. #14 OR #13 OR #12 OR #11 OR #10 OR #9 OR #8 OR #7
16. TS=((remind\* or alert\* or return\* or fail\*) NEAR/2 (patient\* or client\* or service-user\*))
17. TS=((appointment\* or attend\* or arriv\* or consul\*) NEAR/2 (patient\* or client\* or service-user\*))
18. TS=(non?attend or "non attend\*" or "no show")
19. TS=((appointment\* or attend\*) NEAR/6 (complicance or fail\* or keep\* or miss\* or prompt\*))
20. #19 OR #18 OR #17 OR #16
21. #20 AND #15

#### **Appendix 5. (Cochrane database of systematic reviews) & Cochrane Central Register of Controlled Trials search Strategy:**

1. ((cell\* or mobile or wireless) adj (phone\* or telephon\*))
2. (cellphone\* or mobiles or mhealth or m-health)

3. ((mobile or handheld or hand-held) adj2 (device\* or technolog\* or app\* or health\*))
4. ("smart phone\*" or smartphone\* or blackberry or iphone\* or "android phone\*" or "google android" or ipod touch or "personal digital assistant\*" or pda or pdas)
5. #1 or #2 or #3 or #4
6. (text\* or messag\* or multimedia or multi-media or imag\* or mms or data or input\* or application\* or app?)
7. #5 and #6
8. ((text or short or multimedia or multi-media) adj messag\*)
9. (texting\* or texted or texter\* or sms)
10. (mms and (multimedia or multi-media or messag\*))
11. (electronic adj mail\$)
12. (electronic adj3 messag\$)
13. (email\$ or e-mail\$)
14. (noti\* adj6 (patient\* or client\* or service-user\* or people))
15. #7 or #8 or #9 or #10 or #11 or #12 or #13 or #14
16. ((remind\* or alert\* or return\* or fail\*) adj2 (patient\* or client\* or service-user\* or people))
17. ((appointment\* or attend\* or arriv\* or consul\*) adj2 (patient\* or client\* or service-user\* or people))
18. (non?attend or "non attend\*" or "no show")
19. ((appointment\* or attend\*) adj6 (complicance or fail\* or keep\* or miss\* or prompt\*))
20. #16 or #17 or #18 or #19
21. #15 and #20

## Appendix 6: Cochrane Risk of Bias Summary for individual studies

	Random Sequence Generation	Allocation Concealment	Blinding of Outcome Assessment	Incomplete Outcome Data	Selective Reporting	Other Bias	At high risk of bias?
Arora et al. (2015) (22)	L	L	L	L	U	L	N
Bigna et al. (2014) (23)	L	L	L	L	L	U	N
Bos et al. (2005) (24)	H	U	L	U	U	H	Y
Chen et al. (2008) (25)	L	U	L	L	U	U	N
Cho et al (2010) (26)	L	L	L	L	U	L	N
Clough & Casey (2014) (27)	L	H	L	L	U	L	N
Costa et al (2008) (28)	U	U	L	U	U	U	Y
Fairhurst & Sheikh (2008) (29)	L	L	L	L	L	H	N
Koury & Faris (2005) (30)	U	U	U	U	U	U	Y
Leong et al. (2006) (31)	L	H	L	L	L	H	N
*Liew et al. (2009) (32)	L	L	L	L	U	H	N
Lin et al (2012) (33)	L	L	L	L	U	H	N
Narring et al. (2013) (34)	L	U	L	L	U	L	N
Odeny et al. (2012) (35)	L	L	L	L	U	L	N
Perron et al. (2010) (36)	L	U	L	L	U	L	N

Prasad & Anand (2012) (37)	U	U	L	L	U	H	Y
Reeve Mates et al (under review)	L	U	L	L	U	L	N
Rutland et al. (2012) (38)	U	U	U	U	U	U	Y
Taylor et al. (2012) (39)	L	L	L	L	L	L	N
Wang et al. (2014) (40)	L	L	L	L	U	L	N
Youssef, et al. (2014) (17)	L	L	L	L	L	L	N
Included in secondary meta-analysis only							
Fung et al.(2009) (41)	U	U	U	U	U	U	Y
Nelson et al. (2011)(42)	L	U	L	L	U	L	N
Norton et al. (2014)(43)	L	L	L	U	L	U	N
Percac-Lima et al. (2014)(44)	U	U	U	U	U	U	Y
Perron et al. (2013)(45)	L	U	U	L	U	U	Y

Note: Asterisk denotes that the study was included in primary and secondary meta-analyses

Key: L= low risk, H= high risk, U= Unclear risk.

## Appendix 7: Funnel plots

[Figure 4 near here]

[Figure 5 near here]