

Supplemental Appendix 2: Literature Search Strategy, Factors that influence the implementation of (inter)nationally endorsed health and social care standards: a systematic review and meta-summary

Stage one: Bibliographic database search					
EBSCO Database Searches		Search Returns, n			
Date of completion: November 2020		Medline	CINAHL Plus with Full Text	SocINDEX with Full Text	Total
Search 1	Concept 1: Health OR healthcare OR health-care OR "health care" OR "social care" OR "social work" (Ti, AB)	1,997,905	1,103,248	291,012	3,392,165
Search 2	Concept 2: standards OR standard (Ti, AB)	1,003,114	231,213	63,274	1,297,601
Search 3	Concept 3: causes OR influences OR reasons OR determinants OR predictors OR barriers OR obstacles OR challenges OR difficulties OR issues OR problems OR facilitators OR motivators OR enablers OR promoters OR levers OR Facilitat* OR Enabl* (Ti, AB)	5,545,244	1,236,317	829,222	7,610,783
Search 4	Concept 4: Implementation OR implementing OR adoption OR acceptance OR adherence OR compliance OR application OR adher* OR Implement* OR "use of" OR quality improvement OR (MH "quality improvement") (Ti, AB)	4,396,731	1,096,183	416,104	5,909,018
Search 5	S1 AND S2 AND S3 AND S4	22,963	10,678	1,909	35,550
Search 6	S1 N5 S2	14,973	8,479	2,391	25,843
Search 7	S6 AND S3 AND S4	2,859	1,551	399	4,809
Search 7, re-run completed November 2021		+367	+154	+13	+534= 5,343

Stage two: Grey Literature search					
Grey Literature Database Searches		Search Returns, n			
Date of completion: February 2021		Google Scholar	GreyNet International	Open Grey	Total
Search 1	healthcare OR health care OR social care AND standards AND implementation OR implement*	1,1610,00	0	29,433	
Search 2	First 100 hits-titles screened, chronological order	51	0	0	51
Search of targeted Standards-setting bodies' websites Date of completion: February 2021		<ol style="list-style-type: none"> 1. Australian Commission on Safety and Quality in Health Care (Australia) 2. Australian Government, Department of Social Services (Australia) 3. IKAS Danish Institute for Quality and Accreditation in Healthcare (Denmark) 4. Danish quality model in the social area (Denmark) 5. National Institute for Health and Care Excellence (England) 6. Social Care Institute for Excellence (SCIE) (England) 7. Health Information and Quality Authority (Ireland) 8. Standards New Zealand (Ministry of Business, Innovation and Employment) (New Zealand) 9. Department of Health, Social Services and Public Safety (Northern Ireland) 10. Health Quality Ontario (Ontario) 11. Scottish Government (Scotland) 12. Welsh Assembly Government (Wales) 			5
Search 1	"healthcare" OR "health care" OR "social care" and standards and implementation				
Search 2	First 100 hits-titles screened, chronological order				

Supplemental Appendix 3-Inclusion and exclusion criteria for literature search-Factors that influence the implementation of (inter)nationally endorsed health and social care standards: a systematic review and meta-summary

	Inclusion Criteria	Exclusion Criteria
Type of studies	<p>Primary research study</p> <ul style="list-style-type: none"> • Qualitative-ethnography, phenomenology, grounded theory, case studies and qualitative description • Quantitative-experimental designs (randomized controlled trials, non-randomized controlled trials, cohort studies, case-control studies, cross-sectional studies), prevalence studies, surveys, case series and case reports • Mixed-methods design 	<ul style="list-style-type: none"> • Discussion papers, editorials, opinions, letters, dissertations, conference abstracts. • Study protocols • Studies that report secondary data e.g. systematic reviews or scoping reviews. <i>(screen the reference lists of any relevant reviews for potential eligible studies.)</i>
Type of participants	<ul style="list-style-type: none"> • A person who is employed by a health and/or social care organisation and actively involved in developing and/or implementing health and/or social care standards. • A person who is a member of the public, which includes a person with “an interest in health and social care as a public service including potential users of services.” • A person who uses health and social care services such as “patients, service users, clients or their carers.” 	
Type of setting	All settings where health and/or social care standards are implemented.	
Type of intervention	<ul style="list-style-type: none"> • Studies that examine the implementation of health and social care standards. • Studies reporting on factors that influence and hinder implementation of standards. 	<ul style="list-style-type: none"> • Implementation of guidelines, policies, protocols, pathways, strategies, guidance, standard operating procedures. • Standards that are not nationally or internationally endorsed. • Educational standards, technical standards, professional standards.
Timing and language	<ul style="list-style-type: none"> • No time restrictions • No language limits 	

Supplemental Appendix 4: Table of study characteristics-Factors that influence the implementation of (inter)nationally endorsed health and social care standards: a systematic review and meta-summary

Author Name, Year of Publication, Country of Origin	Methodology	Standard	Aim of Study	Sample population and size
Anno et al. (1982),[1] United States of America (USA)	Quantitative-quasi-experimental assessments	American Medical Association (AMA) standards for Jail Health Systems (1979)	To obtain pre/post measures of compliance with AMA standards and to determine level of improvements which had occurred in the health care systems.	Jails, n= 265
Australian Commission on Safety and Quality in Health Care (2014),[2] Australia	Mixed Methods-focus groups, interviews and internet survey	National Standards for Mental Health Services (NSMHS) (2010) National Safety and Quality Health Service (NSQHS) Standards (2010)	To gain an understanding of the levels of implementation of the NSMHS and NSQHS Standards, the enablers and barriers to their implementation and potential gaps relating to safety and quality in the standards.	Focus groups and interviews: Service providers, n=120 service users, n=39 Survey: Service providers, n=369 Service users, n=77
Avent et al. (2014),[3] Australia	Quantitative-questionnaire survey	Standard 3 of Preventing and Controlling Healthcare-Associated Infections of the National Safety and Quality Health Service Standards (2011).	To determine what anti-microbial stewardship (AMS) activities are being undertaken and to identify gaps, barriers to implementation.	Acute care facilities, n=16
Chang et al. 2020,[4] Bangladesh	Mixed Methods (qualitative component)-case study (interviews)	Standards for Improving Quality of Maternal and Newborn Care in Health Facilities, World Health Organisation (WHO) (2016)	To explore stakeholder's understanding of indicators that are relevant to them, and thus to improve provider and manager buy-in. To ask stakeholders to describe the utility and feasibility of incorporating a reduced set of quality indicators into practice.	Representatives from International non-governmental organization and Ministry of Health and Family Welfare, researcher at academic institutions, advisor at a donor organisation, Physicians, Nurses, n=25
Cody et al. (2021),[5] Australia	Quantitative-pre/post intervention audit and survey	Delirium Clinical Care Standard, ACSQHC (2016)	To improve the care delivered in hospitals to patients at risk of, or with, delirium through the implementation of evidence-based delirium practices.	Patient notes, n=143 Survey: Nurses, n=172 Nurses, n=12 acted as delirium champions
Cohen et al. (2003),[6] USA	Quantitative-retrospective review of charts	United States' Joint Commission on Accreditation of Healthcare Organizations (JCAHO) Pain Management Standard (1999)	To determine how application of JCAHO pain management standards are recorded in the charts of cancer patients.	Inpatient charts, Outpatient charts, n=117
de Onis et al. (2012),[7] WHO regions	Quantitative-cross sectional survey	WHO Child Growth Standards (2006)	To record worldwide implementation of the WHO Child Growth Standards and describe the changes in child growth monitoring practices.	National health authorities, n=180

Author Name, Year of Publication, Country of Origin	Methodology	Standard	Aim of Study	Sample population and size
Derksen et al. (2012),[8] Netherlands	Qualitative- focus groups and interviews	National Integrated Health care Standard for Overweight and Obesity Management (2010).	To identify that a practice-based approach is important for the local implementation of obesity management guidelines. To gain a better understanding of perceptions and experiences of older adults with overweight or obesity and health care professionals on opportunities and barriers for local overweight and obesity care.	GPs, GP assisting nurses, Physiotherapists, Dietitians, Community nurses, Psychologists, Older adults (service-user), n=53
Dignan et al. (2021),[9] United Kingdom (UK)	Quantitative- cross sectional survey	Standards for Hematopoietic Cellular Therapy, Joint Accreditation Committee ISCT-Europe & EBMT (JACIE) (2018).	To assess the provision of long-term follow-up for patients following haematopoietic stem cell transplantation for adult patients in the UK and to investigate the provision of care for paediatric patients.	Transplant directors, Physicians, Nurse specialist, n=25
Eeles et al. (2017),[10] Australia	Qualitative- Workshop	Australian Commission on Safety and Quality in Health Care (ACSQHC) Delirium Clinical Care Standard (2016)	To identify which set of interventions addressed barriers to care as per ACSQHC standard for delirium care.	Delirium experts, n=20
Fuller and Dufty (2015),[11] UK	Quantitative- audit	British Association of Sexual Health and HIV (BASHH) and Medical Foundation for HIV and Sexual Health (MEDFASH) Standards for the Management of Sexually Transmitted Infections (STIs) (2014)	To assess the standard of care provided by the sexual health service following training.	Medical centres, n=4 Sexual health consultations, n=147
Gibson & Phillips (2016),[12] USA	Quantitative- causal-comparative surveys	National Commission on Correctional Health Care (NCCHC) Standards for Health Services (2008).	To identify common characteristics of facilities that are compliant or not compliant with the NCCHC standards and specific sections of the standards.	Jails and Prisons, n=616
Granade et al. (2020),[13] USA	Quantitative- questionnaire	Standards for Adult Immunization Practice, National Vaccine Advisory Committee (2014)	To evaluate and describe self-reported use of vaccination improvement strategies and adherence to implementing the Standards.	Physicians, Nurse practitioners, Physician assistants, Pharmacists, n=5705

Author Name, Year of Publication, Country of Origin	Methodology	Standard	Aim of Study	Sample population and size
Greenfield et al. (2015),[14] Australia	Qualitative (multi-method)-document analysis, observation, focus groups and interviews	National Safety and Quality Health Service (NSQHS) Standards (2010)	To investigate the development and implementation of the Australian Health Service Safety and Quality Accreditation Scheme and NSQHS Standards relating to expected benefits, challenges and facilitators to implementation.	Documents: Government reports and ACSQHC website, n=8 Observations: Regulators Working Group, Accrediting Agencies Working Group, n=25 hours Focus Groups/ Interviews: Health-care professionals, Accreditation agency management groups, Professional colleges and associations, Government health-care agency representatives, Accreditation agency assessors, Health-care consumers, n=197
Habte et al. (2020),[15] Ethiopia	Mix Methods-observations, chart review, focus groups and interviews	Nursing and Midwifery Service Quality Standards (2016)	To conduct a survey on the quality of care standards in a nursing and midwifery training hospital.	Chart Review: Wards, n=8 Charts, n=70 Observations: Clients, Nurses, Senior management, n=71 Focus groups and interviews: Instructors, Head nurses, Managers, n=29
Heller et al. (2011),[16] Scotland	Quantitative-retrospective note review	Quality Improvement Scotland (QIS) National Standards for Sexual Health Care (2008)	To determine if the standards set by QIS for sexual health care of HIV-positive patients are being adhered to. To investigate factors associated with the offer of syphilis serology and sexually transmitted infection screening by clinicians.	Patient charts, n=509
Hifinger et al. (2018),[17] Netherlands	Quantitative-cross sectional questionnaire	Standards of care (SOC) for the management of rheumatoid arthritis (RA), European Musculoskeletal Conditions Surveillance and Information Network (2013)	To investigate the patients' and healthcare professionals' perspectives on the level of implementation and importance of SOC for the management of RA. To identify potential barriers towards implementation of optimal care.	Patients, Rheumatologists, Nurses, n=477

Author Name, Year of Publication, Country of Origin	Methodology	Standard	Aim of Study	Sample population and size
Hinchcliff et al. (2013),[18] Australia	Qualitative-focus groups and interviews	National Safety and Quality Health Service (NSQHS) Standards (2010), Aged Care Quality Standards (2010)	To examine healthcare stakeholders' views regarding the factors influencing the implementation of three Australian accreditation programmes.	Health professionals, Government health agency representatives, Health professional colleges and associations, Accreditation agency assessors, Accreditation agency management groups, Consumers or consumer representatives, n=258
Jones et al. (2020),[19] Australia	Quantitative-cross-sectional survey	Australian Commission on Safety and Quality in Health Care (ACSQHC) standards for Antimicrobial Stewardship (AMS) programmes (2014)	To outline AMS activities occurring in Australian hospitals and to identify gaps in compliance across key hospital characteristics including key barriers and enablers to meeting hospital accreditation standards for AMS.	Hospitals, n=254
Knight et al. (2017),[20] UK	Qualitative-structured interview	National Institute for Health and Care Excellence (NICE) Quality Standard on Alcohol Misuse (QS11) (2011)	To investigate the level to which the NICE Quality Standard on Alcohol Misuse (QS11) is implemented and to examine the barriers and facilitators to better implementation.	Medical doctors, Nurses, Public health professionals, Tertiary care professionals, Commissioners, Service user representatives, Clinical psychologist, n=38
Krause et al. (2015),[21] Jordan	Qualitative-focus groups, interviews and facility assessments	The Minimum Initial Service Package (MISP) for Reproductive Health, Standard of Care (2010)	To examine the extent to which the MISP services were in place for Syrian refugees living in Irbid City and Zaatri Camp. To highlight factors that support and hinder the use of MISP services.	Service-users, Key Informants (staff), n=170 Health facilities, n=13
La-Rotta et al. (2013),[22] Brazil	Quantitative-cross-sectional survey	NR-32 Standard Occupational Health and Safety in Health Service Establishments Standard (2004)	To evaluate knowledge of the NR-32 Standard, biosafety, and standard precautions. To understand the factors that facilitate or hinder compliance with NR-32 Standard and the standard precautions by physicians.	Residents (medical graduate), Physicians, n=208
Lawn et al. (2020),[23] Australia	Quantitative-pre and post intervention survey	National Standards for Mental Health Services (2010) and National Safety and Quality Health Service Standards (2012)	To describe carer engagement in relation to the partnership standards in two mental health services from the perspectives of carers of people using the services and of clinical staff within the services.	Carers, n=58 Clinicians, n=93

Author Name, Year of Publication, Country of Origin	Methodology	Standard	Aim of Study	Sample population and size
Lehman et al. (2012),[24] USA	Mixed Methods- Observations, chart review, interview, discussions and focus group.	Bloodborne Pathogens Standard (BBP) (2002)	To report on compliance with 15 key BBP risk reduction standards in eight correctional facilities. To identify potential barriers to compliance with the standards, and to discuss steps that can be taken to address these barriers.	Facilities, n=8 Director, manager, physician, dentist, pharmacist, infection control nurse, registered nurse, nurse practitioner, health/clinic administrator, physician assistant, phlebotomist, medical/laboratory technician, licensed practical nurse, paramedic, public health educator, n=50
McTate et al. (2021),[25] USA	Qualitative- case study	Psychosocial Care of Children with Cancer (2015), Psychosocial Standards of Care Project for Childhood Cancer (PSCPCC)	To describe an approach for meeting the standard of psychosocial care for caregivers of patients who are being treated for oncologic, hematologic, and immunologic diseases in a paediatric medical centre.	Care givers, n=37
Mogakwe et al. (2019),[26] Republic of South Africa	Qualitative- interviews	National Core Standards for Health Establishments (2011)	To explore and describe the reasons why managers are non-compliant with quality standards at Primary Healthcare (PHC) clinics. To make recommendations to facilitate compliance with the standards.	Managers, n=12
Mogakwe et al. (2020),[27] Republic of South Africa	Qualitative- interviews	National Core Standards for Health Establishments (2011)	To explore how compliance with quality standards at PHC clinics could be facilitated.	Managers, n=12
Mogakwe et al. (2020),[28] Republic of South Africa	Qualitative- interviews	National Core Standards (2011)	To explore and describe the reasons for noncompliance with quality standards at the PHC clinics.	Managers, n=12
Raaijmakers et al. (2013),[29] Netherlands	Quantitative- cross-sectional survey	Netherlands Diabetes Federation (NDF) Care Standard (CS) (2003, 2007)	To optimise the implementation of the CS by examining the perceptions of Dutch health care professionals relating to the CS and the barriers to implementation.	General practitioners, Practice nurses, Diabetes nurses, Dietitians, Physiotherapists, Internal medicine physicians, Paediatricians, n=1547

Author Name, Year of Publication, Country of Origin	Methodology	Standard	Aim of Study	Sample population and size
Schalkwijk et al. (2016),[30] Netherlands	Mixed Methods- focus groups, interviews and internet survey	Integrated Health Care Standard on Childhood obesity (2010) Partnership Overweight Netherlands (PON)	To gain insight into the barriers and needs for the implementation of the integrated health care standard according to GPs and other health care providers who manage and treat obesity in children.	Focus Groups and interviews: GPs, Youth Health Care (YHC) nurses, YHC doctors, Paediatricians, Dietitians, Psychologists, Physiotherapists, n=34 Survey: GPs, YHC workers, Paediatricians, Dietitians, Psychologists, Physiotherapists, Obesity coordinator, n=222
Srivastav et al. (2018),[31] USA	Quantitative- internet panel surveys	Standards for Adult Immunization Practice (2014)	To examine the clinicians' and pharmacists' self-reported implementation of the Standards for adult patients seen at their practices. To evaluate reported barriers to vaccination practices, and perceptions regarding their adult patients' attitudes toward vaccines.	Physicians, Physician assistants, Nurse practitioners, Pharmacists, n=1975
Tabrizi et al. (2019),[32] Iran	Quantitative- clinical audit cycle using checklist	Medical Waste Management (MWM) Standards (2008)	To improve the medical waste management (MWM) standards in Tabriz community health centres (CHCs).	Health centres, n=20
Vandervort and D'Eramo (2003),[33] USA	Quantitative- Interviews using a questionnaire	Standards for linguistically and culturally competent health care, U.S. Office for Minority Health (OMH) (2001)	To examine availability and utility of linguistic services for patients with limited English proficiency at community health centres and compare findings to standards for linguistically and culturally competent health care.	Clinic directors, Clinic employee, n=8
Wiener et al. (2018),[34] USA	Quantitative- descriptive survey	Psychosocial Care of Children with Cancer (2015) Psychosocial Standards of Care Project for Childhood Cancer (PSCPCC)	To examine practices and barriers to implementing bereavement care according to the Psychosocial Standards of Care.	Palliative care physicians, Oncologists, Nurse Practitioner/ physician assistants, Nurses, Social workers, Child life specialists, Psychologists, n=100
Wilkinson et al. (2018),[35] UK	Quantitative- cross sectional questionnaire	NICE Multiple Sclerosis (MS) Quality Standard (2016)	To analyse the experience of MS specialists on how their services adhered to the NICE quality statements.	MS specialists, Nurses, Pharmacists, Physiotherapists, n=57

Author Name, Year of Publication, Country of Origin	Methodology	Standard	Aim of Study	Sample population and size
Yahyavi et al. (2018),[36] Iran	Quantitative-cross-sectional questionnaire	The Third Generation of National Accreditation Standards for hospitals (2016)	To determine the challenges of implementing The Third Generation of National Accreditation Standards in hospitals.	Managers, Physicians, Nurses, n=239
Zakarija-Grković et al. (2018),[37] Croatia	Quantitative-interviews using questionnaire	UNICEF/ World Health Organisation (WHO) Standards for seven of the Ten Steps of the Baby-Friendly Hospital Initiative (BFHI) (1991)	To assess compliance with UNICEF/ WHO standards for seven of the Ten Steps of the BFHI. To investigate improvement in hospital practices and influence of BFHI on breastfeeding rates.	Mothers, n=1,115

Supplemental Appendix 5-Quality Appraisal Assessment-Factors that influence the implementation of (inter)nationally endorsed health and social care standards: a systematic review and meta-summary

JBICritical Appraisal Checklist Quasi-Experimental Studies (Non-Randomised Experimental Studies)[38]	Assessment of methodological limitations	Is it clear in the study what is the 'cause' and what is the 'effect' (i.e. there is no confusion about which variable comes first)?	Were the participants included in any comparisons similar?	Were the participants included in any comparisons receiving similar treatment/ care, other than the exposure or intervention of interest?	Was there a control group?	Were there multiple measurements of the outcome both pre and post the intervention/ exposure?	Was follow up complete and if not, were differences between groups in terms of their follow up adequately described and analysed?	Were the outcomes of participants included in any comparisons measured in the same way?	Were outcomes measured in a reliable way?	Was appropriate statistical analysis used?		
Anno 1982[1]	MINOR CONCERNS	✓	✓	?	✗	✓	?	✓	✗	✓		
Cody 2021[5]	MODERATE CONCERNS	✓	✓	?	✗	✓	?	✓	?	?		
Gibson 2016[12]	MINOR CONCERNS	✓	✓	✗	✗	✗	✓	?	✓	✓		
Lawn 2020[23]	NO CONCERNS	✓	✓	✓	✗	✓	✓	✓	✓	✓		
Tabrizi 2019[32]	NO CONCERNS	✓	N/A	N/A	✗	✓	✓	✓	✓	✓		
JBICritical Appraisal Checklist for Cohort Studies[38]	Methodological Limitations	Were the two groups similar and recruited from the same population?	Were the exposures measured similarly to assign people to both exposed and unexposed groups?	Was the exposure measured in a valid and reliable way?	Were confounding factors identified?	Were strategies to deal with confounding factors stated?	Were the groups/ participants free of the outcome at the start of the study (or at the moment of exposure)?	Were the outcomes measured in a valid and reliable way?	Was the follow up time reported and sufficient to be long enough for outcomes to occur?	Was follow up complete, and if not, were the reasons to loss to follow up described and explored?	Were strategies to address incomplete follow up utilized?	Was appropriate statistical analysis used?
Granade 2020[13]	NO CONCERNS	✓	✓	✓	✓	✓	✗	✓	✓	?	N/A	✓
Zakarija-Grković 2018[37]	NO CONCERNS	✓	✓	✓	✓	?	✓	✓	✓	✓	N/A	✓
JBICritical Appraisal Checklist for Analytical Cross Sectional Studies[38]	Methodological Limitations	Were the criteria for inclusion in the sample clearly defined?	Were the study subjects and the setting described in detail?	Was the exposure measured in a valid and reliable way?	Were objective, standard criteria used for measurement of the condition?	Were confounding factors identified?	Were strategies to deal with confounding factors stated?	Were the outcomes measured in a valid and reliable way?	Was appropriate statistical analysis used?			
Hifinger 2018[17]	NO CONCERNS	✓	✓	✓	✓	✓	✓	✓	✓			
La-Rotta 2013[22]	NO CONCERNS	✓	✓	✓	✓	✓	N/A	✓	✓			
Raaijmakers 2013[29]	MINOR CONCERNS	✗	✓	?	✓	✓	✓	?	✓			
Wilkinson 2018[35]	MODERATE CONCERNS	?	✓	?	✓	✗	?	?	✓			

JBI Critical Appraisal Checklist for Studies Reporting Prevalence Data[38]	Methodological Limitations	Was the sample frame appropriate to address the target population?	Were study participants sampled in an appropriate way?	Was the sample size adequate?	Were the study subjects and the setting described in detail?	Was the data analysis conducted with sufficient coverage of the identified sample?	Were valid methods used for the identification of the condition?	Was the condition measured in a standard, reliable way for all participants?	Was there appropriate statistical analysis?	Was the response rate adequate, and if not, was the low response rate managed appropriately?		
Avent 2014[3]	NO CONCERNS	✓	✓	✓	✓	✓	✓	✓	N/A	✓		
de Onis 2012[7]	NO CONCERNS	✓	✓	✓	✓	?	✓	✓	?	✓		
Dignam 2021[9]	MINOR CONCERNS	✓	✓	?	✓	✓	N/A	N/A	?	✗		
Jones 2020[19]	NO CONCERNS	✓	✓	✗	✓	✓	✓	✓	✓	✓		
Srivastav 2018[31]	NO CONCERNS	✓	✓	✓	✓	✓	✓	✓	✓	?		
Wiener 2018[34]	MINOR CONCERNS	✓	✓	✗	✓	✗	✓	?	✓	✗		
Yahyavi 2018[36]	NO CONCERNS	✓	✓	✓	✓	✓	N/A	✓	✓	?		
JBI Critical Appraisal Checklist for Case Series[38]	Methodological Limitations	Were there clear criteria for inclusion in the case series?	Was the condition measured in a standard, reliable way for all participants included in the case series?	Were valid methods used for identification of the condition for all participants included in the case series?	Did the case series have consecutive inclusion of participants?	Did the case series have complete inclusion of participants?	Was there clear reporting of the demographics of the participants in the study?	Was there clear reporting of clinical information of the participants?	Were the outcomes or follow up results of cases clearly reported?	Was there clear reporting of the presenting site(s)/clinic(s) demographic information?	Was statistical analysis appropriate?	
Cohen 2003[6]	MINOR CONCERNS	✓	✓	✓	✗	✗	✓	✗	N/A	✓	✓	
Heller 2011[16]	MINOR CONCERNS	✓	✓	✓	✓	?	?	?	✓	✗	✓	
CASP Qualitative Checklist[39]	Methodological Limitations	Is there a clear statement of the aims?	Is a qualitative methodology appropriate?	Is the research design appropriate to address aims of research?	Was the recruitment strategy appropriate to the aims of the research?	Was the data collected in a way that addressed the research issue?	Has the relationship between researcher and participants been adequately considered?	Have ethical issues been taken into consideration?	Was the data analysis sufficiently rigorous?	Is there a clear statement of findings?	How valuable is the research?	
Chang 2020[4]	NO CONCERNS	✓	✓	✓	✓	✓	✓	✓	✓	✓	VALUABLE	
Derksen 2012[8]	NO CONCERNS	✓	✓	✓	✓	✓	?	✓	✓	✓	VALUABLE	
Eeles 2017[10]	MINOR CONCERNS	✓	✓	✓	✓	✓	?	?	?	✓	VALUABLE	
Greenfield 2015[14]	NO CONCERNS	✓	✓	✓	✓	✓	?	✓	✓	✓	VALUABLE	
Hinchcliff 2013[18]	NO CONCERNS	✓	✓	✓	✓	✓	✓	✓	✓	✓	VALUABLE	
Knight 2017[20]	NO CONCERNS	✓	✓	✓	✓	✓	✓	✓	✓	✓	VALUABLE	
Krause 2015[21]	MINOR CONCERNS	✓	✓	?	✓	✓	✗	✓	✓	✓	LOW	
McTate 2021[25]	MINOR CONCERNS	✓	✓	✓	?	?	✗	✓	?	✓	VALUABLE	

CASP Qualitative Checklist[39]	Methodological Limitations	Is there a clear statement of the aims?	Is a qualitative methodology appropriate?	Is the research design appropriate to address aims of research?	Was the recruitment strategy appropriate to the aims of the research	Was the data collected in a way that addressed the research issue?	Has the relationship between researcher and participants been adequately considered?	Have ethical issues been taken into consideration?	Was the data analysis sufficiently rigorous?	Is there a clear statement of findings?	How valuable is the research?	
Mogakwe 2019[26]	MINOR CONCERNS	?	✓	✓	✓	✓	✓	✓	?	✓	LOW	
Mogakwe. 2020[27]	MINOR CONCERNS	✓	✓	✓	?	✓	✓	✓	?	✗	VALUABLE	
Mogakwe 2020[28]	MINOR CONCERNS	✓	✓	✓	?	✓	✓	✓	?	✗	VALUABLE	
Vandervort 2003[33]	MODERATE CONCERNS	✗	?	✗	?	?	✗	✓	✗	✓	LOW	
MMAT[40]	Methodological Limitations	Are there clear research questions?	Do the collected data allow to address the research questions?	Is there an adequate rationale for using a mixed methods design to address the research question?	Are the different components of the study effectively integrated to answer the research question?	Are the outputs of the integration of qualitative and quantitative components adequately interpreted?	Are divergences and inconsistencies between quantitative and qualitative results adequately addressed?	Do the different components of the study adhere to the quality criteria of each tradition of the methods involved?				
ACSQHC* 2014[2]	NO CONCERNS	✓	✓	✓	✓	✓	N/A	✓				
Habte 2020[15]	MODERATE CONCERNS	✗	?	✗	✓	?	?	✓				
Lehman 2012[24]	MINOR CONCERNS	✓	✓	✓	✓	✓	?	?				
Schalkwijk 2016[30]	NO CONCERNS	✗	✓	✓	✓	✓	✓	✓				

Evidence-based Librarianship critical appraisal checklist[41]	Methodological Limitations	Is the study population representative of all users, actual and eligible, who might be included in the study?	Are inclusion and exclusion criteria definitively outlined?	Is the sample size large enough for sufficiently precise estimates?	Is the response rate large enough for sufficiently precise estimates?	Is the choice of population bias-free?	Was informed consent obtained?	Are data collection methods clearly described?	If a face-to-face survey, were inter-observer and intra-observer bias reduced?	Is the data collection instrument validated?	If based on regularly collected statistics, are the statistics free from subjectivity?	Does the study measure the outcome at a time appropriate for capturing the intervention's effect?
Fuller 2015[11]	MINOR CONCERNS	✓	?	N/A	N/A	✓	N/A	✓	N/A	?	N/A	✓
		Is the instrument included in the publication?	Are questions posed clearly enough to be able to elicit precise answers?	Were those involved in data collection not involved in delivering a service to the target population?	Is the study type / methodology utilized appropriate?	Is there face validity?	Is the research methodology clearly stated at a level of detail that would allow its replication?	Was ethics approval obtained?	Are the outcomes clearly stated and discussed in relation to the data collection?	Are all the results clearly outlined?	Are confounding variables accounted for?	Do the conclusions accurately reflect the analysis?
		✓	✓	✓	✓	?	✓	?	✓	✓	?	✓

✓=Yes, ✗=No, ?=Unclear, N/A=not applicable

*ACSQHC: Australian Commission on Safety and Quality in Health Care

Supplemental Appendix 6-Summary of Findings using GRADE-CERQual[42]-Factors that influence the implementation of (inter)nationally endorsed health and social care standards: a systematic review and meta-summary

Summary of review finding Thematic Statements describing enablers to implementing health and social care Standards	Studies contributing to the review finding	Methodological limitations	Coherence	Adequacy	Relevance	CERQual assessment of confidence in the evidence	Explanation of CERQual assessment
Standards are simplified, tailored and feasible for implementation in day-to-day practice.	[2,4,17,24,34] 5 studies included	Minor concerns 2 studies with minor methodological limitations due to unclear reporting of sample and data analysis.	no concerns	no concerns	no concerns	High confidence	
Standards are reviewed for continued relevance for implementation and application to practice.	[2,3,14,18] 4 studies included	No concerns	no concerns	no concerns	no concerns	High confidence	
Recruitment and availability of staff such as designated personnel who act as champions and role models are key elements to implementation of standards.	[2,4,5,11,13,14,16,20-22,24,27,30,33,35,37] 16 studies included	Moderate concerns 4 studies with minor methodological limitations due to unclear reporting of data collection, sample and analysis. No evidence of reflexivity in 1 qualitative study. 3 studies with moderate methodological limitations due to poor reporting of sampling, data collection, valid measures in 2 quantitative studies. Poor reporting on data collection, recruitment process and analysis, limited evidence of reflexivity in 1 qualitative study.	no concerns	Minor concerns about 3 studies having low number of study participants.[27,33,35]	no concerns	Moderate confidence	Moderate confidence due to methodological limitations. Minor to moderate concerns about adequacy.
Shared knowledge and interprofessional collaborations enable implementation of standards.	[1-8,10,14,15,19,25,26,32,34,37] 17 studies included	Minor concerns 6 studies with minor methodological limitations due to unclear reporting of sample, valid measures for quantitative studies. Unclear rigour of analysis and limited evidence of reflexivity in qualitative studies. 2 studies with moderate methodological limitations due to poor rigour of sampling and analysis in 1 study and poor integration of findings, poor rationale for mixed methods approach in 1 study.	no concerns	Minor concerns about 1 study[26] having low number of study participants.	Minor concerns about 1 study conducted in jail/ prison environment. [1]	High confidence	

Summary of review finding Thematic Statements describing enablers to implementing health and social care Standards	Studies contributing to the review finding	Methodological limitations	Coherence	Adequacy	Relevance	CERQual assessment of confidence in the evidence	Explanation of CERQual assessment
Knowledge of the standards and skills to perform are fundamental to implementation of standards.	[3,6,11,21,22,24,27,30] 8 studies included	Minor concerns 5 studies with minor methodological limitations due to unclear reporting of sample, data collection for quantitative studies. Limited evidence of reflexivity and rigour of recruitment, analysis in qualitative studies and unclear integration of findings in mixed-methods study.	no concerns	Minor concern as 1 study[27] had low number of study participants.	no concerns	High confidence	
Services have managers that provide leadership, commitment and support to assist with implementing standards.	[2-4,15,20,22,25-27,32] 10 studies included	Minor concerns 3 qualitative studies with minor methodological limitations due to unclear rigour of analysis (1 study did not report on reflexivity and 1 study did not present clear findings.) 1 study with moderate methodological limitations due to no research question or rationale for using mixed methods approach and unclear integration of findings.	no concerns	Minor concerns as 1 study (2 papers) [26,27] had low number of study participants.	no concerns	High confidence	
Services collaborate in partnership with service users as an essential step to implementing standards.	[2,6,10,15,21] 5 studies included	Minor concerns 3 studies with minor methodological limitations due to unclear reporting of sample in 1 quantitative study, limited evidence of reflexivity in 2 qualitative studies. 1 study with moderate methodological limitations due to no clear research question or rationale for using mixed methods approach and unclear integration of findings.	no concerns	no concerns	no concerns	High confidence	
Services have effective supports available to service-users to support implementation of standards.	[5,6,8,20,25,30] 6 studies included	Minor concerns 2 studies with minor methodological limitations due to unclear reporting of sample in quantitative study and unclear reporting of data collection and analysis, limited evidence of reflexivity in qualitative study.	no concerns	no concerns	no concerns	High confidence	

Summary of review finding Thematic Statements describing enablers to implementing health and social care Standards	Studies contributing to the review finding	Methodological limitations	Coherence	Adequacy	Relevance	CERQual assessment of confidence in the evidence	Explanation of CERQual assessment
		1 quantitative study with moderate methodological limitations due to unclear reporting of sample, reliable measures and analysis.					
Standards are incorporated into practice by providing the necessary resources such as supplies, equipment and health screening systems.	[2,7,10,11,13,17,22,24,27,32,35,37] 12 studies included	Minor concerns 3 studies with minor methodological limitations due to limited evidence of reflexivity and ethical considerations, unclear reporting of analysis and clear findings in qualitative studies. Unclear reporting of data collection in 1 quantitative study and unclear integration of findings in mixed-methods study. 1 quantitative study with moderate methodological limitations due to poor reporting on sample and reliable measures.	no concerns	Minor concerns about 2 studies[27,35] having low study participants.	no concerns	High confidence	
Standards implementation is allocated sufficient budgets to support necessary resources such as supplies and equipment.	[3,21,27] 3 studies included	Minor concerns 2 qualitative studies with minor methodological limitations due to limited evidence of reflexivity, unclear research aim, limited evidence in rigour of analysis and unclear research findings.	no concerns	Moderate concerns due to 1 study[27] had low number of study participants and limited number of studies reporting this finding.	no concerns	Low confidence	Low confidence due to methodological limitations and moderate concerns about adequacy.
Service size, space and maintenance of infrastructure facilitates implementation of standards.	[1,21,27] 3 studies included	Minor concerns 3 studies with minor methodological limitations due to unclear sample and outcome measures in 1 quantitative study. Limited evidence of reflexivity, unclear research aim, and limited evidence in rigour of analysis and unclear research findings in 2 qualitative studies.	no concerns	Moderate concerns due to 1 study having low number of study[27] participants. Minor concerns as limited number of studies reporting this finding.	Moderate concern due to 1 study conducted in jail/ prison setting.[1]	Low confidence	Low confidence due to methodological limitations and moderate concerns about adequacy and relevance.
Services have quality improvement activities	[3,11,15,20,22,31,32,34,35]	Minor concerns	no concerns	Minor concerns due to 1	no concerns	High confidence	

Summary of review finding Thematic Statements describing enablers to implementing health and social care Standards	Studies contributing to the review finding	Methodological limitations	Coherence	Adequacy	Relevance	CERQual assessment of confidence in the evidence	Explanation of CERQual assessment
including capacity building such as specialist programmes and staff engagement to improve adherence to the standards.	9 studies included	2 studies (quantitative) with minor methodological limitations due to unclear reporting of sample, data collection and reliable measures. 2 studies with moderate methodological limitations due to no clear research question or rationale for using mixed methods approach and unclear integration of findings. Poor reporting of sample and reliable measures in quantitative study.		study[35] having low number of study participants.			
Services appreciate staff members and acknowledge their workloads to optimise performances with standards.	[2,11,15,20,27,30] 6 studies included	Minor concerns 2 studies with minor methodological limitations due to unclear reporting of data collection, reliable measures in 1 quantitative study. Unclear reporting of recruitment, analysis and findings in 1 qualitative study. 1 mix-methods study with moderate methodological limitations due to no clear research question or rationale for using mixed methods approach and unclear integration of findings.	no concerns	no concerns	no concerns	High confidence	
Standards become part of everyday practice when there is credibility that they are an impetus to safety and quality improvements.	[2,14,24,29,32,33] 6 studies included	Minor concerns 2 studies with minor methodological limitations due to unclear reporting on sample and reliable measures in 1 quantitative study. Unclear reporting on integration of findings in mix-methods study. 1 qualitative study with moderate methodological limitations due to poor reporting on data collection, recruitment process and analysis, limited evidence of reflexivity.	no concerns	Minor concerns due to 1 study[33] having low number of participants.	no concerns	High confidence	
Services have a culture of ongoing quality improvement to encourage quality standards implementation.	[2,14,32] 3 studies included	No concerns	no concerns	Moderate concerns as limited number of studies reporting this finding.	no concerns	Moderate confidence	Moderate confidence due to moderate concerns about adequacy.

Summary of review finding Thematic Statements describing enablers to implementing health and social care Standards	Studies contributing to the review finding	Methodological limitations	Coherence	Adequacy	Relevance	CERQual assessment of confidence in the evidence	Explanation of CERQual assessment
Services have financial incentives to motivate implementation of standards.	[2,18,20] 3 studies included	No concerns	no concerns	Moderate concerns as limited number of studies reporting this finding.	no concerns	Moderate confidence	Moderate confidence due to moderate concerns about adequacy.
Services have accessible educational materials to raise awareness and understanding of standards.	[2,5-7,14,17,22,24,30,32,33] 11 studies included	Minor concerns 2 studies with minor methodological limitations due to unclear reporting of sample in 1 quantitative study. Unclear reporting on integration of findings in 1 mix-methods study. 2 studies with moderate methodological limitations due to poor reporting of sample, reliable measures and analysis in 1 quantitative study. Poor reporting on data collection, recruitment process and analysis, limited evidence of reflexivity in 1 qualitative study.	no concerns	Minor concern as 1 study[33] had low number of participants.	no concerns	High confidence	
Services use effective communication strategies to disseminate and promote information on standards.	[2,3,24] 3 studies included	Minor concerns 1 mix-methods study with minor methodological limitations due to unclear reporting on integration of findings.	no concerns	Moderate concerns as limited number of studies reporting this finding.	no concerns	Moderate confidence	Moderate confidence due to minor methodological limitations and moderate concerns about adequacy.
Services have training courses and workshops to increase awareness and knowledge of the standards and help implement the standards.	[1-3,5-7,10,11,15,19,21,22,24,27,32-34,37] 18 studies included	Minor concerns 8 studies with minor methodological limitations due to unclear reporting of sample, data collection and reliable measures in 4 quantitative studies. Unclear reporting of research aim, data analysis, findings in 3 qualitative studies. Unclear reporting on integration of findings in 1 mix-methods study.	no concerns	Minor concerns as 2 studies[27,33] had low number of study participants.	Minor concern as 1 study conducted in jail/ prison setting.[1]	High confidence	

Summary of review finding Thematic Statements describing enablers to implementing health and social care Standards	Studies contributing to the review finding	Methodological limitations	Coherence	Adequacy	Relevance	CERQual assessment of confidence in the evidence	Explanation of CERQual assessment
		3 studies with moderate methodological limitations due to poor reporting of sample and analysis in 1 quantitative study. Poor reporting on data collection, recruitment process and analysis, limited evidence of reflexivity in 1 qualitative study. No clear research question or rationale for using mixed methods approach and unclear integration of findings in 1 mix-methods study.					
Services use support tools at local level to prompt compliance, improve performances and assure effective implementation of standards.	[2-7,11,13,16,19,21,24-26,29,30,33,34] 18 studies included	Minor concerns 9 studies with minor methodological limitations due to unclear reporting of sample, data collection and reliable measures in 5 quantitative studies. Unclear reporting of research aim, data analysis, findings, limited evidence of reflexivity in 3 qualitative studies. Unclear reporting on integration of findings in 1 mix-methods study. 2 studies with moderate methodological limitations due to poor reporting on data collection, recruitment process and analysis, limited evidence of reflexivity in 1 qualitative study. Poor reporting of sample, reliable measures and analysis in 1 quantitative study.	no concerns	Minor concerns as 2 studies[26,33] had low number of participants.	no concerns	High confidence	
Services have internal monitoring, audit and feedback processes to guide quality improvements.	[2-4,6,8,9,20,22,25,26,30,32] 12 studies included	No concerns 4 studies with minor methodological limitations due to unclear reporting of sample and analysis in 2 quantitative studies. Unclear reporting of research aim, data collection and analysis in 2 qualitative studies.	no concerns	no concerns	no concerns	High confidence	
Services have external mandatory requirements such as national benchmarking, accreditation or regulation to motivate implementation of standards.	[2,7,14,18,19] 5 studies included	No concerns	no concerns	no concerns	no concerns	High confidence	

Summary of review finding Thematic Statements describing barriers to implementing health and social care Standards	Studies contributing to the review finding	Methodological limitations	Coherence	Adequacy	Relevance	CERQual assessment of confidence in the evidence	Explanation of CERQual assessment
Standards have limited applicability due to inherent differences between services including geographical locations.	[2,6,17,18,20,29,35] 7 studies included	Minor concerns 2 quantitative studies with minor methodological limitations due to unclear reporting of sample and reliable measures. 1 quantitative study with moderate methodological limitations due to poor reporting of sample and reliable measures.	no concerns	Minor concern as 1 study[35] had low number of participants.	no concerns	High confidence	
Standards overlap and use compliance or medical oriented language making them difficult to embed in practice.	[2,4,36] 3 studies included	No concerns	no concerns	Moderate concerns as limited number of studies reporting this finding.	no concerns	Moderate confidence	Moderate confidence due to minor concern about adequacy.
Standards do not align well with legislation, accreditation or regulatory frameworks.	[2,14,29] 3 studies included	Minor concerns 1 quantitative study with minor methodological limitations due to unclear reporting of sample and reliable measures.	no concerns	Moderate concerns as limited number of studies reporting this finding.	no concerns	Moderate confidence	Moderate confidence due to minor concern about methodological limitations and minor concern about adequacy.
Services have a lack of knowledge, awareness and understanding of what standards are.	[2,3,5,6,8,10,11,14,15,20-24,27-30,32,33,35-37] 23 studies included	Minor concerns as large number of studies with high quality appraisals (11) and moderate quality appraisals (7). 7 studies with minor methodological limitations due to unclear reporting of sample and data collection in 2 quantitative studies. Limited evidence of reflexivity, ethical considerations, lack of rigour of analysis and unclear findings in 5 qualitative studies. 5 studies with moderate methodological limitations due to poor reporting of sample, analysis and reliable measures in 2	no concerns	Minor concerns with low number of study participants in 3 studies[27,28,33]	no concerns	High confidence	

Summary of review finding Thematic Statements describing barriers to implementing health and social care Standards	Studies contributing to the review finding	Methodological limitations	Coherence	Adequacy	Relevance	CERQual assessment of confidence in the evidence	Explanation of CERQual assessment
		quantitative studies. Limited evidence of rigour of recruitment, data collection, analysis and reflexivity in 1 qualitative study. Poor rationale for mix-methods study and poor integration of findings in 2 mixed-methods studies.					
Services are experiencing staffing constraints that act as a barrier to complying with standards.	[1-4,7,11,19-21,24,25,27,28,30,31,33-35] 18 studies included	Minor concerns 8 studies with minor methodological limitations due to limited evidence of reflexivity and unclear rigour of analysis and recruitment in 4 qualitative studies. Unclear reporting of sample and reliable measures in 3 quantitative studies. Poor integration of findings in 1 mix-methods study. 2 studies with moderate methodological limitations due to limited evidence of rigour of data collection and analysis. Reflexivity not reported in 1 qualitative study. Poor reporting on sample and reliable measures in 1 quantitative study.	no concerns	Minor concerns with low number of study participants in 3 studies[27,28,33]	Minor concern as 1 study took place in jail/prison setting.[1]	High confidence	
Services have managers who do not support staff to comply with the standards.	[3,15,19,24,26-28,33,34,36] 10 studies included	Minor concerns 5 studies with minor methodological limitations due to unclear aim, findings and unclear reporting of analysis in 3 qualitative papers. Unclear reporting of sample and reliable measures in 1 quantitative study and unclear integration of findings in 1 mix-methods study. 2 studies with moderate methodological limitations due to unclear aim, data collection, recruitment and analysis approach and no reflexivity reported in 1 qualitative study. Poor rationale for using mix-methods design and unclear integration of findings in 1 mix-methods study.	no concerns	Moderate concern with low number of study participants in 4 studies.[26-28,33]	no concerns	Moderate confidence	Moderate confidence due to methodological limitations and moderate concerns about adequacy.

Summary of review finding Thematic Statements describing barriers to implementing health and social care Standards	Studies contributing to the review finding	Methodological limitations	Coherence	Adequacy	Relevance	CERQual assessment of confidence in the evidence	Explanation of CERQual assessment
Services take a mono-disciplinary approach with poor communication practices resulting in a lack of shared understanding and knowledge and poor implementation of standards.	[2,8,20,21,26-28,30,35] 9 studies included	Minor concerns 4 qualitative studies with minor methodological limitations due to unclear aim, findings and limited rigour of analysis and limited evidence of reflexivity. 1 quantitative study with moderate methodological limitations due to poor reporting of sample and reliable measures.	no concerns	Moderate concern with low number of study participants in 4 studies[26-28,35]	No concerns	Moderate confidence	Moderate confidence due to methodological limitations and moderate concerns about adequacy.
Services do not involve staff members including managers and professionals in decision-making and implementation of standards.	[15,24,27,28,36] 5 studies included	Moderate concerns 3 studies with minor methodological limitations due to poor reporting in rigour of analysis in 2 qualitative papers and unclear integration of findings in 1 mix-method study. 1 mix-method study with moderate methodological limitations due to poor rationale for using mix-methods approach and poor integration of findings. .	no concerns	Moderate concern with low number of study participants in 2 studies.[27,28]	No concerns	Moderate confidence	Moderate confidence due to methodological limitations and moderate concern about adequacy.
Service-users lack awareness and knowledge leading to misconceptions about healthcare and demotivates standards implementation.	[2,6,8,21,30,31,35,37] 8 studies included	Minor concerns 2 studies with minor methodological limitations due to limited evidence of reflexivity in 1 qualitative study and unclear reporting of sample in 1 quantitative study. 1 study with moderate methodological limitations due to poor reporting of sample and reliable measures.	no concerns	Minor concern with low number of study participants in 1 study.[35]	no concerns	High confidence	Moderate confidence due to methodological limitations and minor concerns about adequacy.
Services do not have appropriate supports available to service-users including families and carers to comply with standards.	[2,5,8,20,23,25,29,34] 8 studies included	Minor concerns 3 studies with minor methodological limitations due to unclear reporting of sample and reliable measures in 2 quantitative studies. Unclear recruitment, analysis and limited evidence of reflexivity in 1 qualitative study.	no concerns	no concerns	no concerns	High confidence	

Summary of review finding Thematic Statements describing barriers to implementing health and social care Standards	Studies contributing to the review finding	Methodological limitations	Coherence	Adequacy	Relevance	CERQual assessment of confidence in the evidence	Explanation of CERQual assessment
		1 quantitative study with moderate methodological limitations due to poor reporting of sample and analysis.					
Standards may harm relationships between healthcare professionals and service-users. As such, healthcare professionals are reluctant to implement the standards.	[2,8,10,30] 4 studies included	No concerns 1 qualitative study with minor methodological limitations due to unclear evidence of reflexivity, ethical considerations and rigour of analysis.	no concerns	Minor concerns as low number of studies reporting this finding.	No concerns	High confidence	3 studies have high quality appraisals, no concerns regarding coherence and relevance.
Services have insufficient funds causing resource issues and competing tenders for safety and quality projects impacting on implementing the standards.	[2-4,7,9,11,17,19,21,27,28,30,31,33,34,36] 16 studies included	No concerns (only 1 study with moderate limitations) 5 studies with minor methodological limitations due to unclear reporting of sample, analysis and reliable measures in 3 quantitative studies. Limited evidence of reflexivity, unclear rigour of analysis in 2 qualitative studies. 1 qualitative study with moderate methodological limitations due to unclear aim, poor reporting of recruitment, data collection and analysis. No evidence of reflexivity.	no concerns	Minor concern with low number of study participants in 3 studies[27,28,33]	no concerns	High confidence	
Services have a limited supply of resources such as equipment and medical supplies and hence are unable to provide all the activities set out in the standards.	[3,4,7,15,19-22,24,27-29,31,32,35] 15 studies included	Minor Concerns 5 studies with minor methodological limitations due to unclear aim, unclear rigour of analysis, limited evidence of reflexivity in 3 qualitative studies. Unclear reporting of sample and reliable measures in 1 quantitative study. Unclear integration of findings in 1 mix-method study. 2 studies with moderate methodological limitations due to poor reporting of sample and reliable measures in 1 quantitative study and poor rationale for using mix-methods	no concerns	Minor concern with low number of study participants in 2 studies.[27,28]	no concerns	High confidence	

Summary of review finding Thematic Statements describing barriers to implementing health and social care Standards	Studies contributing to the review finding	Methodological limitations	Coherence	Adequacy	Relevance	CERQual assessment of confidence in the evidence	Explanation of CERQual assessment
		design and poor evidence of integration of findings in 1 mix-methods study.					
Services do not have specialist programmes to implement the standards effectively.	[1-3,19,20,30,32,34,35,37] 10 studies included	Minor concerns 2 quantitative studies with minor methodological limitations due to unclear reporting of sample and reliable measure. 1 quantitative study with moderate methodological limitations due to poor reporting of sample and outcome measures.	no concerns	Minor concern with low number of study participants. in 1 study[35]	Minor concerns about relevance as 1 study conducted in jail/prison setting.[1]	High confidence	
Services have infrastructural issues such as limited space and service size affecting compliance with standards.	[1,2,9,15,24,27,28,32,34,36] 10 studies included	Minor concerns 6 studies with minor methodological limitations due to unclear reporting of sample, analysis and reliable measures in 3 quantitative studies. Unclear reporting in rigour of analysis and study findings in 2 qualitative studies. Unclear integration of findings in 1 mix-method study 1 study with moderate methodological limitations due to poor rationale for using mix-methods design and poor evidence of integration of findings in 1 mix-methods study.	no concerns	Minor concern with low number of study participants in 2 studies.[27,28]	Minor concerns about relevance as 1 study conducted in jail/prison setting.[1]	Moderate confidence	Moderate confidence due to methodological limitations and minor concerns about adequacy and relevance.
Services have insufficient time to implement standards due to increased service capacity and work overload.	[2,4,7,10,12,15,17,20,21,26,28,30,34-36] 15 studies included	Minor concerns 6 studies with minor methodological limitations due to unclear aim, limited evidence of: reflexivity; ethical considerations; rigour of analysis in 4 qualitative studies. Unclear reporting of sample in 2 quantitative studies. 2 studies with moderate methodological limitations due to poor reporting of sample and outcome measures in 1 quantitative study. Poor rationale for using mix-methods	no concerns	Minor concerns with low number of study participants in 3 studies.[26,28,35]	Minor concerns about relevance as 1 study conducted in jail/prison setting.[12]	High confidence	

Summary of review finding Thematic Statements describing barriers to implementing health and social care Standards	Studies contributing to the review finding	Methodological limitations	Coherence	Adequacy	Relevance	CERQual assessment of confidence in the evidence	Explanation of CERQual assessment
		design and poor evidence of integration of findings in 1 mix-method study.					
Services have entrenched cultures that resist change acting as a barrier to implementing standards.	[2,3,6,7,13,16,19,21,22,25,30,32,35,36] 14 studies included	No concerns 4 studies with minor methodological limitations due to unclear reporting of sample in 2 quantitative studies and unclear reporting in rigour of analysis and limited evidence of reflexivity in 2 qualitative studies. 1 study with moderate methodological limitations due to poor reporting of sample, unclear measures	no concerns	Minor concern with low number of study participants in 1 study.[35]	no concerns	High confidence	
Services have competing priorities and hence variations can exist with implementation of standards.	[2,3,5,7,11,24,35] 7 studies included	Minor concerns 2 studies with minor methodological limitations due to unclear integration of findings in 1 mix-method study. Unclear data collection and measures in 1 quantitative study. 2 studies with moderate methodological limitations due to poor reporting of sample, unclear measures and rigour of analysis in 2 quantitative studies.	no concerns	Minor concern with low number of study participants in 1 study.[35]	no concerns	High confidence	
Services have unclear accountability systems resulting in a misunderstanding of roles and responsibilities with implementing standards.	[2,8,15,23,30,31] 6 studies included	No concerns 1 study with moderate methodological limitations due to poor rationale for using mix-methods design and poor evidence of integration of findings in 1 mix-method study.	no concerns	no concerns	no concerns	High confidence	
Services perceive the Standards as not being the norm for high quality care and in doing so, hinders implementation.	[14,29,35] 3 studies included	Moderate concerns 1 quantitative study with minor methodological limitations due to unclear reporting of sample and reliable measures.	no concerns	Moderate concern as 1 study[35] had low number of study participants and	no concerns	Low confidence	Low confidence due to methodological limitations and moderate

Summary of review finding Thematic Statements describing barriers to implementing health and social care Standards	Studies contributing to the review finding	Methodological limitations	Coherence	Adequacy	Relevance	CERQual assessment of confidence in the evidence	Explanation of CERQual assessment
		1 quantitative study with moderate methodological limitations due poor reporting of sample and reliable measures.		limited number of studies reporting this finding.			concerns about adequacy.
Services experience challenges with education and training such as cost, replacing staff, time and this acts as a barrier to establishing the standards.	[1-3,11,15,19,20,24,29,32,33] 11 studies included	Minor concerns 3 quantitative studies with minor methodological limitations due to unclear sample, reliable measures and data collection. Unclear integration of findings in 1 mix-method study. 2 studies with moderate methodological limitations due to 1 qualitative study with moderate methodological limitations due to unclear aim, poor reporting of recruitment, data collection and analysis. No evidence of reflexivity. Poor rationale for using mix-methods design and poor evidence of integration of findings in 1 mix-method study.	no concerns	Minor concern as 1 study had low number of study participants.[33]	Minor concerns about relevance as 1 study took place in jail/prison setting.[1]	High confidence	
Services have an absence of clear policies, guidelines, protocols and pathways at local and national level to support local implementation of standards.	[5,6,8,9,20,21,29,30,32,34] 10 studies included	Minor concerns 5 studies with minor methodological limitations due to unclear reporting ample, analysis and reliable measures in 4 quantitative studies. Unclear aim and limited evidence of reflexivity in 1 qualitative study. 1 study with moderate methodological limitations due to poor reporting of sample, unclear measures and rigour of analysis.	no concerns	no concerns	No concerns	High confidence	
Services do not have internal monitoring and evaluation processes to assess the effectiveness of standards implementation.	[2,3,6,14,32,33,37] 7 studies included	Minor concerns 1 quantitative study with minor methodological limitations due to unclear reporting of sample.	no concerns	Minor concern as 1 study has low number of study participants.[33]	No concerns	High confidence	

Summary of review finding Thematic Statements describing barriers to implementing health and social care Standards	Studies contributing to the review finding	Methodological limitations	Coherence	Adequacy	Relevance	CERQual assessment of confidence in the evidence	Explanation of CERQual assessment
		1 study with moderate methodological limitations due to unclear aim, poor reporting of recruitment, data collection and analysis. No evidence of reflexivity.					
Services are at risk of inconsistent external assessments and judgements about standards implementation due to different monitoring agencies.	[4,14] 2 studies included	No concerns	no concerns	Moderate concern about limited number of studies reporting this finding.	No concerns	Low confidence	Low confidence due to moderate concerns about adequacy.

Supplemental Table 3: Meta-summary findings, including themes and thematic statements describing enablers to implementing (inter)nationally endorsed health and social care standards, with calculated frequency effect sizes and intensity effect sizes.

	Frequency Effect Size	ACSQH ¹ (2014)	Avent (2014)	Lehman (2012)	Tabrizi (2019)	Cohen (2003)	Greenfield (2015)	La-Rotta (2013)	Mogakwe (2020)	Fuller & Duffy (2015)	Knight (2017)	Krause (2015)	Schalkwijk (2016)	Chang 2020	Cody (2021)	de Onis (2012)	Habte (2020)	McTate (2021)	Vandervort (2003)	Wiener (2018)	Studies n=13 ⁺
Intensity Effect Size (IES)	%	77	45	41	41	36	36	36	36	32	32	32	32	27	27	27	27	23	23	23	<20
Themes and thematic statements*																					
1. Standards are adaptable in day-to-day practice.																					
Standards are simplified, tailored and feasible for implementation in day-to-day practice.	16																				1 [§]
Standards are reviewed for continued relevance for implementation and application to practice.	12																				1 [§]
2. Services have key staff who will lead and share knowledge of the standards.																					
Recruitment and availability of staff such as designated personnel who act as champions and role models are key elements to implementation of standards.	52																				4 [§]
Shared knowledge and interprofessional collaborations enable implementation of standards.	45																				6 [§]
Knowledge of the standards and skills to perform are fundamental to implementation of standards.	26																				
Services have managers that provide leadership, commitment and support to assist with implementing standards.	26																				1 [§]
3. Services collaborate with people using services.																					
Services collaborate in partnership with service users as an essential step to implementing standards.	16																				1 [§]
Services have effective supports available to service-users to support implementation of standards.	13																				1 [§]
4. Services have access to resources.																					
Standards are incorporated into practice by providing necessary resources such as supplies, equipment and health screening systems.	39																				5 [§]
Standards implementation is allocated sufficient budgets to support necessary resources such as supplies and equipment.	10																				
Service size, space and maintenance of infrastructure facilitates implementation of standards.	10																				1 [§]
5. Services promote quality improvements and value staff in doing so.																					

	Frequency Effect Size	ACSQH†(2014)	Avent (2014)	Lehman (2012)	Tabrizi (2019)	Cohen (2003)	Greenfield (2015)	La-Rotta (2013)	Mogakwe (2020)	Fuller & Dufty (2015)	Knight (2017)	Krause (2015)	Schalkwijk (2016)	Chang 2020	Cody (2021)	de Onis (2012)	Habte (2020)	McTate (2021)	Vandervort (2003)	Wiener (2018)	Studies n=13‡
Intensity Effect Size (IES)	%	77	45	41	41	36	36	36	36	32	32	32	32	27	27	27	27	23	23	23	<20
Themes and thematic statements*																					
Services have quality improvement activities including capacity building such as specialist programmes and staff engagement to improve adherence to the standards.	32																				2§
Services appreciate staff members and acknowledge their workloads to optimise performances with standards.	19																				
Standards become part of everyday practice when there is credibility that they are an impetus to safety and quality improvements.	19																				1§
Services have a culture of ongoing quality improvement to encourage quality standards implementation.	10																				
Services have financial incentives to motivate implementation of standards.	10																				1§
6. Services have accessible training, support tools and monitoring practices.																					
Services use support tools at local level to prompt compliance, improve performances and assure effective implementation of standards.	55																				4§
Services have training courses to increase awareness and knowledge of the standards and help implement the standards.	52																				4§
Services have accessible educational materials to raise awareness and understanding of standards.	32																				1§
Services have internal monitoring, audit and feedback processes to guide quality improvements.	32																				1§
Services use effective communication strategies to disseminate and promote information on standards.	10																				
Services have external mandatory requirements such as national benchmarking, accreditation or regulation to motivate implementation of standards.	10																				2§

*Thematic statements describing enablers to implementing (inter)nationally endorsed health and social care standards. Shaded boxes represents the presence of the enabler in the corresponding study. Effect sizes are presented as percentages. Due to the high volume of studies, studies with IES< 20% are grouped. †ACSQHC: Australian Commission on Safety and Quality in Health Care; ‡n: number of studies with IES<20%; §Number of studies with IES<20% reporting corresponding enabler.

Supplemental Table 4: Meta-summary findings, including themes and thematic statements describing barriers to implementing (inter)nationally endorsed health and social care standards, with calculated frequency effect sizes* and intensity effect sizes.

	<i>Frequency Effect Size</i>	ACSQHC [†] (2014)	Schalkwijk (2016)	Wilkinson (2018)	Avent (2014)	Knight (2017)	Krause (2015)	Mogakwe (2020)	Dignan (2021)	Habte (2020)	Lawn (2021)	Lehman (2012)	Mogakwe (2020)	Raaijmakers (2013)	Tabrizi (2019)	Yahyavi (2018)	Derksen (2012)	Chang 2020	Cohen (2003)	de Onis (2012)	Vandervort (2003)	Wiener (2018)	Fuller & Duffy (2015)	Greenfield (2015)	Srivastav (2018)	Studies n [‡] = 13	
Intensity Effect Size	%	75	46	46	42	42	38	38	33	33	33	33	33	33	33	33	29	25	25	25	25	23	21	21	21	<20	
Themes and thematic statements[§]																											
1. Standards have limited adaptability.																											
Standards have limited applicability due to inherent differences between services including geographical locations.	20																										2 ¹
2. Services work in silos, have limitations with staffing and knowledge of standards.																											
Services have a lack of knowledge, awareness and understanding of what standards are.	63																										4 ¹
Services are experiencing staffing constraints that act as a barrier to complying with standards.	46																										3 ¹
Services have managers who do not support staff to comply with the standards.	23																										2 ¹
Services take a mono-disciplinary approach with poor communication practices resulting in a lack of shared understanding and knowledge and poor implementation of standards.	20																										1 ¹
Services do not involve staff members including managers and professionals in decision-making and implementation of standards.	11																										
3. Services and service-users have misconceptions about healthcare and support.																											
Service-users lack awareness and knowledge leading to misconceptions about healthcare and demotivates standards implementation.	23																										1 ¹
Services do not have appropriate supports available to service-users including families and carers to comply with standards.	23																										2 ¹
Standards may harm relationships between healthcare professionals and service-users. As such, healthcare professionals are reluctant to implement the standards.	11																										1 ¹
4. Services have poor access to resources and funding.																											

	Frequency Effect Size	ACSQHC [†] (2014)	Schalkwijk (2016)	Wilkinson (2018)	Avent (2014)	Knight (2017)	Krause (2015)	Mogakwe (2020)	Dignan (2021)	Habte (2020)	Lawn (2021)	Lehman (2012)	Mogakwe (2020)	Raaijmakers (2013)	Tabrizi (2019)	Yahyavi (2018)	Derksen (2012)	Chang 2020	Cohen (2003)	de Onis (2012)	Vandervort (2003)	Wiener (2018)	Fuller & Duffy (2015)	Greenfield (2015)	Srivastav (2018)	Studies n [‡] = 13
Intensity Effect Size	%	75	46	46	42	42	38	38	33	33	33	33	33	33	33	33	29	25	25	25	25	23	21	21	21	<20
Themes and thematic statements[§]																										
Services have insufficient funds causing resource issues and competing tenders for safety and quality projects impacting on implementing the standards.	43																									2 ¹
Services have a limited supply of resources such as equipment and medical supplies and hence are unable to provide all the activities set out in the standards.	40																									2 ¹
Services do not have specialist programmes to implement the standards effectively.	29																									3 ¹
Services have infrastructural issues such as limited space and service size affecting compliance with standards.	26																									1 ¹
5. Services experience resistance to change due to cultural practices.																										
Services have insufficient time to implement standards due to increased service capacity and work overload.	40																									4 ¹
Services have entrenched cultures that resist change acting as a barrier to implementing standards.	40																									5 ¹
Services have competing priorities and hence variations can exist with implementation of standards.	20																									1 ¹
Services have unclear accountability systems resulting in a misunderstanding of roles and responsibilities with implementing standards.	17																									
6. Services have a lack of training, support tools and consistent monitoring processes.																										
Services experience challenges with education and training such as cost, replacing staff, time and this acts as a barrier to establishing the standards.	31																									2 ¹
Services have an absence of clear policies, guidelines, protocols and pathways at local and national level to support local implementation of standards.	29																									1 ¹
Services do not have internal monitoring and evaluation processes to assess the effectiveness of standards implementation.	20																									1 ¹

*Barriers with a frequency effect size (FES) <10% are not displayed but are discussed in the main manuscript and studies with an intensity effect size (IES) <20% are grouped. Effect sizes are presented as percentages. §Thematic statements describing barriers to implementing (inter)nationally endorsed health and social care standards. Shaded boxes represents the presence of the barrier in the corresponding study. †ACSQHC: Australian Commission on Safety and Quality in Health Care; ‡n=number of studies with IES<20%; ¶Number of studies with IES<20% reporting corresponding barrier.

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