

APPENDIX 2**Research Question**

In adolescents aged 10 -19years old, what are the cost-effectiveness of gender-transformative interventions on preventing unintended pregnancy and promoting sexual health?

PICO Format

P -adolescents (10-19years old), boys and girls

I – Gender transformative interventions addressing the WHO Sexual Reproductive Health Rights outcomes (SRHR) domains.

- Ensuring the health of pregnant girls and their infants
- Preventing unintended pregnancies and unsafe abortion
- Promoting sexual health and wellbeing (prevention of sexually transmitted infections and HIV)
- Promoting sexual reproductive health in disease outbreaks
- Preventing and responding to violence against girls and harmful practices like female genital mutilation, early and forced marriages

O – economic evaluations

- Cost effectiveness
- Cost utility
- Cost benefit
- Cost minimization analysis
- Costing analysis
- Cost consequence analysis
- Decision analysis

Search Strategy – PUBMED

a. MeSH Terms

Concepts #1 Adolescents	Mesh terms: "Adolescent"[Mesh] Search Terms/ key words: Adolescents or Adolescence or Teens or Teen or Teenagers or Teenager or Youth or Youths or Female Adolescent, or Female Adolescents or Male Adolescent or Male Adolescents or minor or minors
#2 SRHR	MeSH terms: "Reproductive Health"[Mesh] OR "Reproductive Health Services"[Mesh] OR "Sexual Health"[Mesh] OR "Pregnancy"[Mesh] OR "Pregnancy, Unplanned"[Mesh] OR "Sex Offenses"[Mesh] OR "Abortion, Criminal"[Mesh] OR "Abortion, Legal"[Mesh] OR "Abortion, Induced"[Mesh] OR "Condoms"[Mesh] OR "Condoms, Female"[Mesh] OR OR "Gender-Based Violence"[Mesh] OR "Sexually Transmitted Diseases"[Mesh] Search terms: sexual health or reproductive health or maternal health or maternal welfare or maternal mortality or neonatal health or perinatal care or perinatal health or prenatal care or prenatal health or antenatal health or ante-natal health or postnatal health or postnatal health or post-part* or post part* or newborn health or family planning or

	<p>contracepti* or condoms or condom or pregnan* or abortion or pregnancy termination or induced abortion or</p> <p>abort* or birth or miscarriage or spontaneous abortion or stillb* or Minimum Initial Service Package or obstetric* or gynecology or gynaecology or safe motherhood or safe delivery or or sexually transmitted infection* or sexually transmitted disease* or HIV or Human immunodeficiency virus or AIDS or acquired immune deficiency syndrome or PMTCT</p> <p>gender based violence or partner violence or family violence or violence against women or domestic violence or sexual abuse or sex crime or sexual crime or or sexual violence or rape or intimate partner violence or partner violence or partner abuse or sexual assault or sexual harassment or sexual coercion or forced sex or sexual exploitation or coercive control or or female genital mutilation or FGM or female genital cutting or FGMC or female circumcis* or (early and marriage) or (child and marriage) or (forced and marriage) or (arranged and marriage) or (abduction and marriage)</p>
# 3 Economic evaluation	<p>MeSH terms "Cost-Benefit Analysis"[Mesh] OR "Decision Support Techniques"[Mesh]</p> <p>Key words: Cost-Benefit or Cost-Benefit Analyses or Cost Benefit Analys* or Cost Effectiveness or Cost-Benefit Data or Cost Benefit Data or Data, Cost-Benefit or Cost-Utility Analysis or Analyses, Cost-Utility Analysis, Cost-Utility or Cost Utility Analys* or Economic Evaluation* or Economic Evaluations or</p> <p>Marginal Analysis or Analyses, Marginal or Analysis, Marginal or Marginal Analyses or Cost Benefit or Costs and Benefits or Benefits and Costs or Cost-Effectiveness Analysis or Analysis, Cost-Effectiveness or Cost Effectiveness Analysis or Costing analys* or cost minimization analys* or cost minimisation analys* or cost consequence analys*</p>
#4 Gender transformative intervention	<p>Search terms: "gender transformative intervention*" OR "gender transformative approach*"</p>

Search will be conducted using MeSH terms and free text from the listed terms using advanced search options on PubMed.

- 1 "gender transformative intervention*"
- 2 "gender transformative approach*"
- 3 1 OR 2
- 4 "reproductive health" or "Reproductive Health"[MESH] or "Reproductive Health Services"[MESH]
- 5 "sexual health" or "Sexual Health"[MESH]
- 6 "sexual reproductive health"
- 7 "sexually transmitted infection*"
- 8 "sexually transmitted disease*" or "Sexually Transmitted Diseases"[MESH]
- 9 "HIV"
- 10 "Human immunodeficiency virus"
- 11 "AIDS"
- 12 "Acquired immuno deficiency syndrome"
- 13 4 or 5 or 6 or 7 or 8 or 9 or 10 or 11 or 12
- 14 "family planning"
- 15 "contracept*"
- 16 "condom*" or "Condoms"[Mesh]
- 17 "condom use"
- 18 "pregnan*" or "Pregnancy"[Mesh]
- 19 "unintended pregnan*" or "Pregnancy, Unplanned"[MESH]
- 20 "abort*"
- 21 "unsafe abort*"
- 22 14 or 15 or 16 or 17 or 18 or 19 or 20 or 21
- 23 "gender based violence"
- 24 "domestic violence"
- 25 "partner violence"
- 26 "violence against girls"
- 27 "sexual abuse"
- 28 "sex crime"
- 29 "sexual crime"
- 30 "intimate partner violence" or "Intimate Partner Violence"[MESH]

- 31 "sexual assault" or "Sex Offenses"[MESH]
- 32 "coercive control"
- 33 23 or 24 or 25 or 26 or 27 or 28 or 29 or 30 or 31 or 32
- 34 "female genital mutilation"
- 35 "FGM"
- 36 "female genital cutting"
- 37 "FGC"
- 38 34 or 35 or 36 or 37
- 39 "early marriage"
- 40 "arranged marriage"
- 41 "child marriage"
- 42 38 or 39 or 40
- 43 "economic evaluation"
- 44 "cost benefit analys*" or "cost benefit" or "Cost-Benefit Analysis"[MESH]
- 45 "cost effectiveness" or "cost effectiveness analys*"
- 46 "cost utility" or "cost utility analys*"
- 47 "cost analys*"
- 48 "cost consequence analys*" or "cost consequence"
- 49 "cost minimization" OR "cost minimization analysis"
- 50 "cost minimisation" OR "cost minimisation analysis"
- 51 "decision modelling"
- 52 "decision analysis"
- 53 "decision analytic modelling"
- 54 43 or 44 or 45 or 46 or 47 or 48 or 49 or 50 or 51 or 52 or 53
- 55 3 or 13 or 22 or 33 or 38 or 42
- 56 "Adolescen*" or "teen*" or "youth*" or "girl*" or "boy*" or "male adolescen*" or "female adolescen*" or "Adolescent"[MESH]"
- 57 "adolescent boy" or "adolescent girl*" or "adolescent boys and girls"
- 58 56 or 57
- 59 54 AND 55
- 60 59 AND 58

Limits for the search are Human studies and publication years 1990 -2021