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 Maternal and Child
Survival Program

Intrauterine Devices (IUDs)

Mark Hathaway, MD, MPH

Family Planning and Reproductive Health Senior Technical Advisor
MCSP/Jhpiego

Terminology



- IUD: Intrauterine device
- IUC: Intrauterine contraception
- IUS: Intrauterine system
- LARC: long-acting reversible contraception (i.e., IUD and implant)

General Overview of Intrauterine Devices

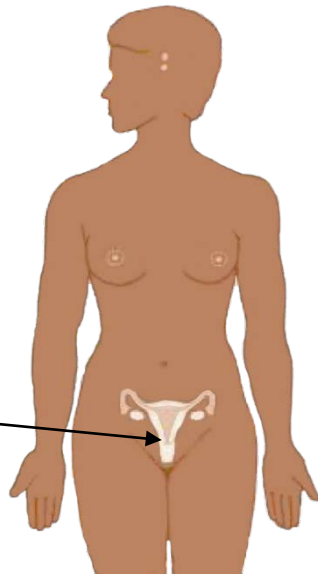
- Small, T-shaped device placed in the uterus
- Safe
- Simple to use (low-maintenance)
- Highly effective
- Immediately effective
- Rapid return of fertility
- Long-term protection



How do they work?

Non-hormonal IUD (Copper)

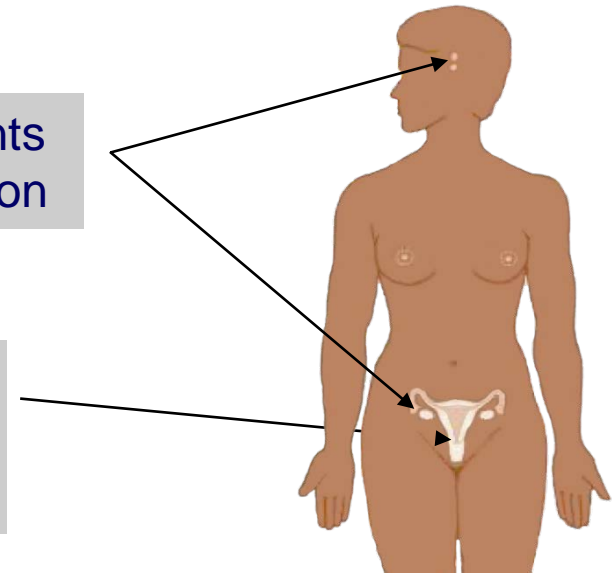
Incapacitates
sperm



Hormonal IUD (LNG-IUS)

Prevents
ovulation

Thickens
cervical
mucus



How Contraception Works: Mechanisms of Action

Incapacitates Sperm

- Copper IUD

All contraceptives prevent fertilization of the egg by the sperm

Prevents Ovulation (release of egg from the ovary)

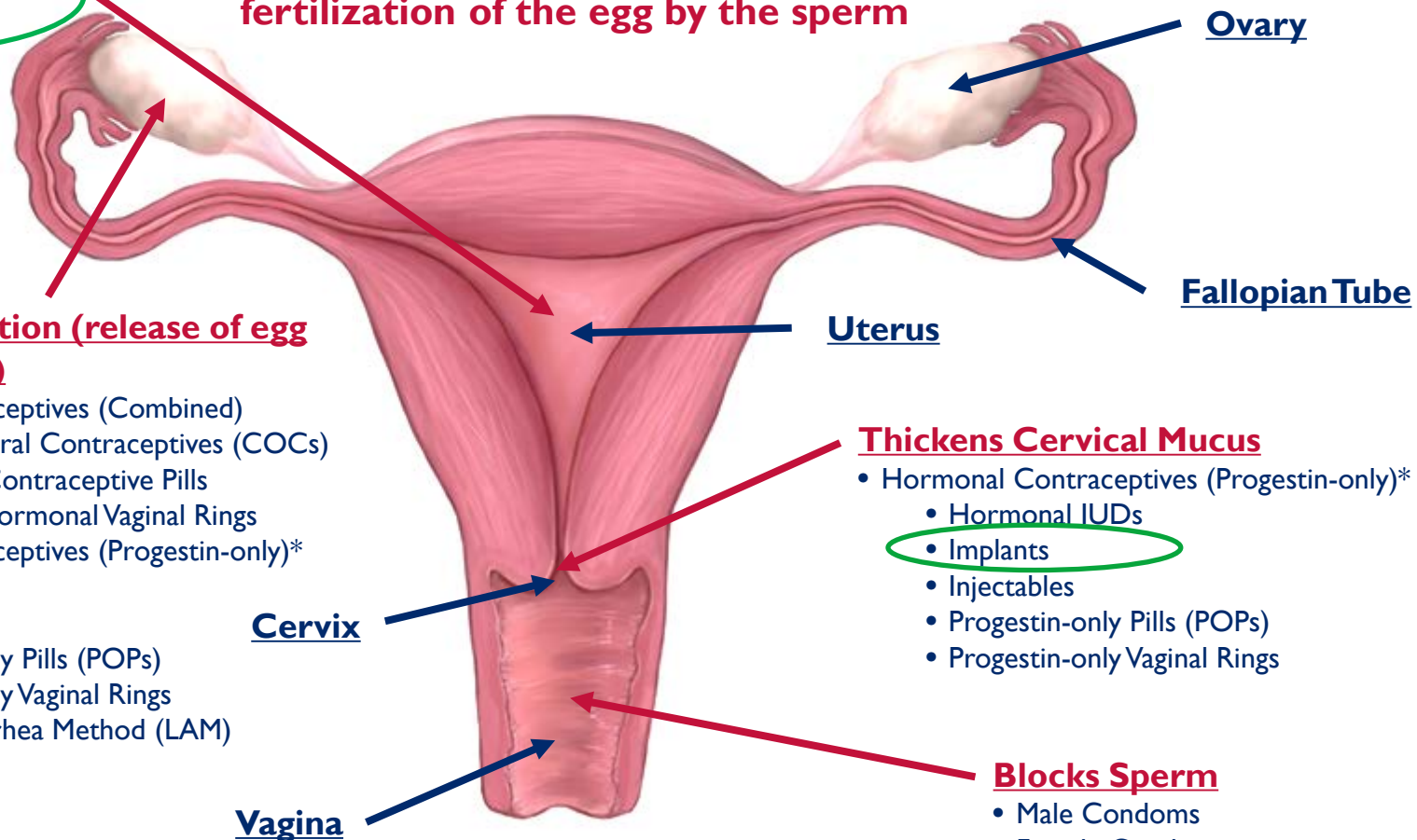
- Hormonal Contraceptives (Combined)
 - Combined Oral Contraceptives (COCs)
 - Emergency Contraceptive Pills
 - Combined Hormonal Vaginal Rings
- Hormonal Contraceptives (Progestin-only)*
 - Implants
 - Injectables
 - Progestin-only Pills (POPs)
 - Progestin-only Vaginal Rings
- Lactation Amenorrhea Method (LAM)

Thickens Cervical Mucus

- Hormonal Contraceptives (Progestin-only)*
 - Hormonal IUDs
 - Implants
 - Injectables
 - Progestin-only Pills (POPs)
 - Progestin-only Vaginal Rings

Blocks Sperm

- Male Condoms
- Female Condoms



* Progestin-only hormonal methods have more than one mechanism of action.



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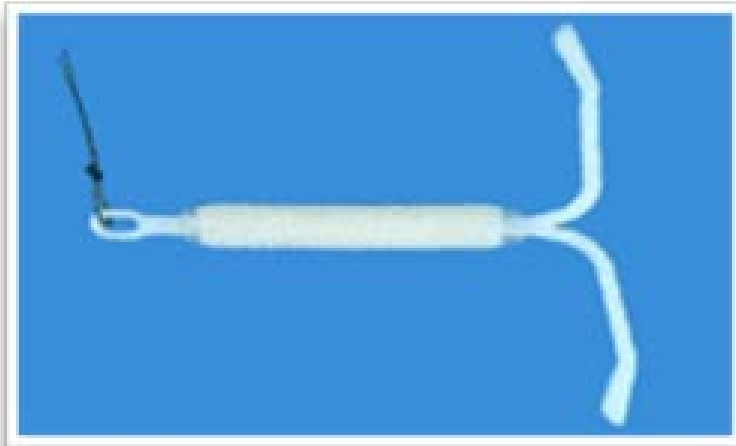
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Non-hormonal IUD: Copper-T



- ParaGard®
- Copper ions
- Approved for 10 years of use; effective for up to 12

Hormonal IUDs: LNG IUS



- LNG 52 IUS
 - Mirena[®] and Liletta[®]
 - Release LNG 20 $\mu\text{g}/\text{d}$
 - Approved use:
 - Mirena: 5 yrs
 - Liletta: 4 yrs
- LNG 19.5 IUS
 - Kyleena[®]
 - Releases LNG 17.5 $\mu\text{g}/\text{d}$
 - Approved use: 5 yrs
- LNG 13.5 IUS
 - Skyla[™]
 - Releases LNG 14 $\mu\text{g}/\text{d}$
 - Approved use: 3 yrs

Advantages

- Very effective and cost effective (over time)
- Easy - “get it, forget it”
- No partner cooperation needed
- Safe for breast feeding
- Reversible with quick return to fertility
- Hormonal IUD relieves heavy menses/cramps (anemia)
- Can be inserted after vaginal delivery, C-Section or during post-abortion care
- Reduces cancer risks: endometrial, ovarian and cervical(?)

Disadvantages

- Device cost (LNG-IUS) and insertion costs
- Requires a skilled provider for insertion and removal
- Instruments/equipment needed
- Discomfort at time of placement
- Copper IUD may cause increased bleeding/cramps
- No protection from STIs/HIV

Equipment required for IUD insertion



- Speculum
- Long Scissors
- Ring forceps
- Tenaculum forceps
- Uterine Sound
- Cotton balls
- Gloves
- Betadine

Comparing Typical Effectiveness of Contraceptive Methods

More effective

Less than 1 pregnancy per 100 women in one year



Implant



Vasectomy



Female Sterilization



IUC



Injectable



Pills



Patch



Ring



Diaphragm



Male Condoms



Female Condoms



Sponge



Withdrawal



Spermicides



Fertility Awareness- Based Methods

How to make your method most effective

After procedure, little or nothing to do or remember

Vasectomy: Use another method for first 3 months

Injections: Get repeat injections on time

Pills: Take a pill each day

Patch, ring: Keep in place, change on time

Diaphragm: Use correctly every time you have sex

Condoms, sponge, withdrawal, spermicides: Use correctly every time you have sex

Fertility-awareness based methods: Abstain or use condoms on fertile days. Newest methods (Standard Days Method and TwoDay Method) may be the easiest to use and consequently more effective

6-12 pregnancies per 100 women in one year

Less effective

18 or more pregnancies per 100 women in one year

HOW WELL DOES BIRTH CONTROL WORK?

What is your chance of getting pregnant?

Really, really well

Works, hassle-free, for up to...

The Implant (Nexplanon)	IUD (Skyla)	IUD (Mirena)	IUD (ParaGard)	Sterilization, for men and women
3 years	3 years	5 years	12 years	Forever

No hormones

Less than 1 in 100 women

O.K.

For it to work best, use it...

The Pill	The Patch	The Ring	The Shot (Depo-Provera)
Every. Single. Day.	Every week	Every month	Every 3 months

6-9 in 100 women, depending on method

Not as well

For each of these methods to work, you or your partner have to use it every single time you have sex.

Pulling Out	Fertility Awareness	Diaphragm	Condoms, for men or women

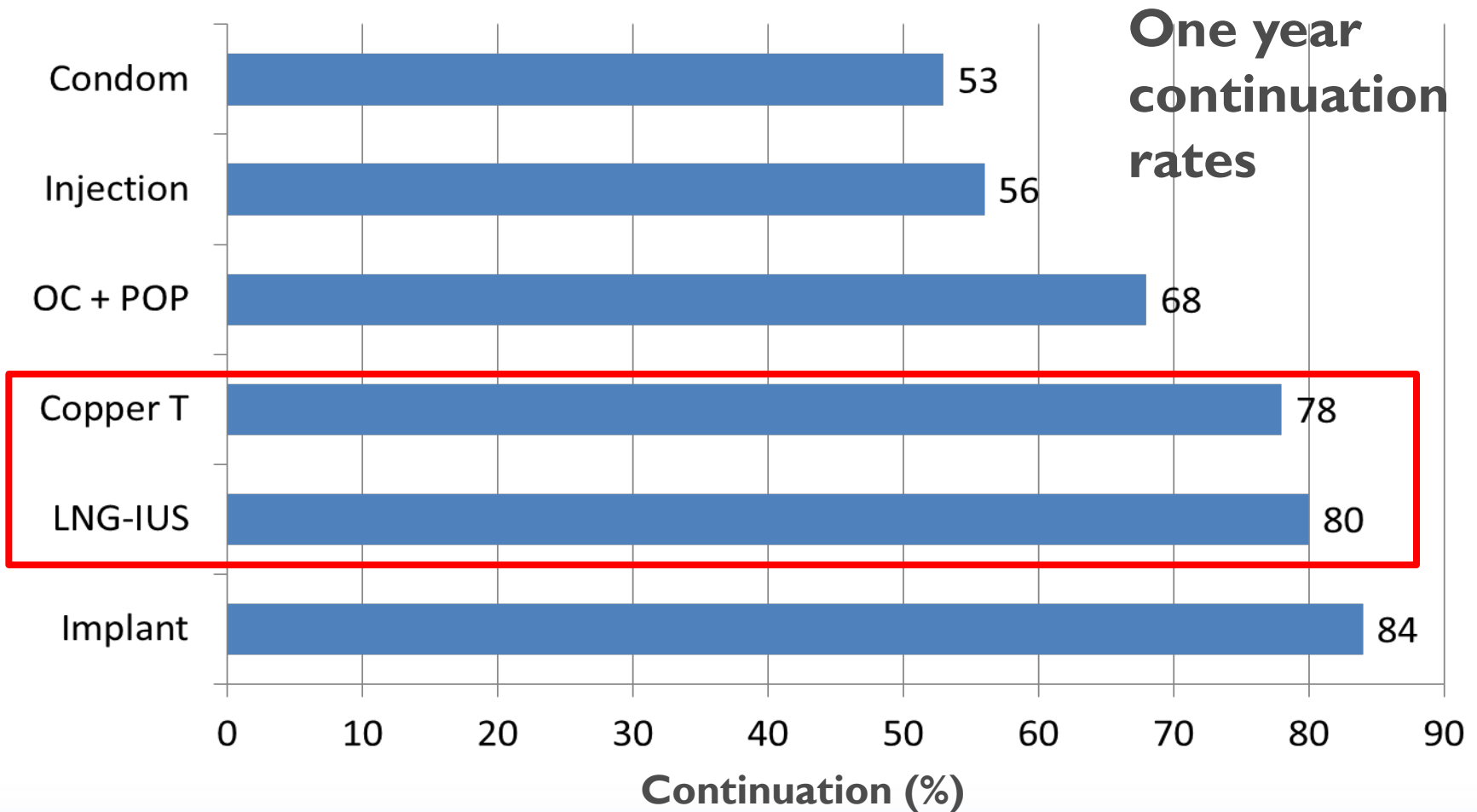
Needed for STD protection!

Use with any other method

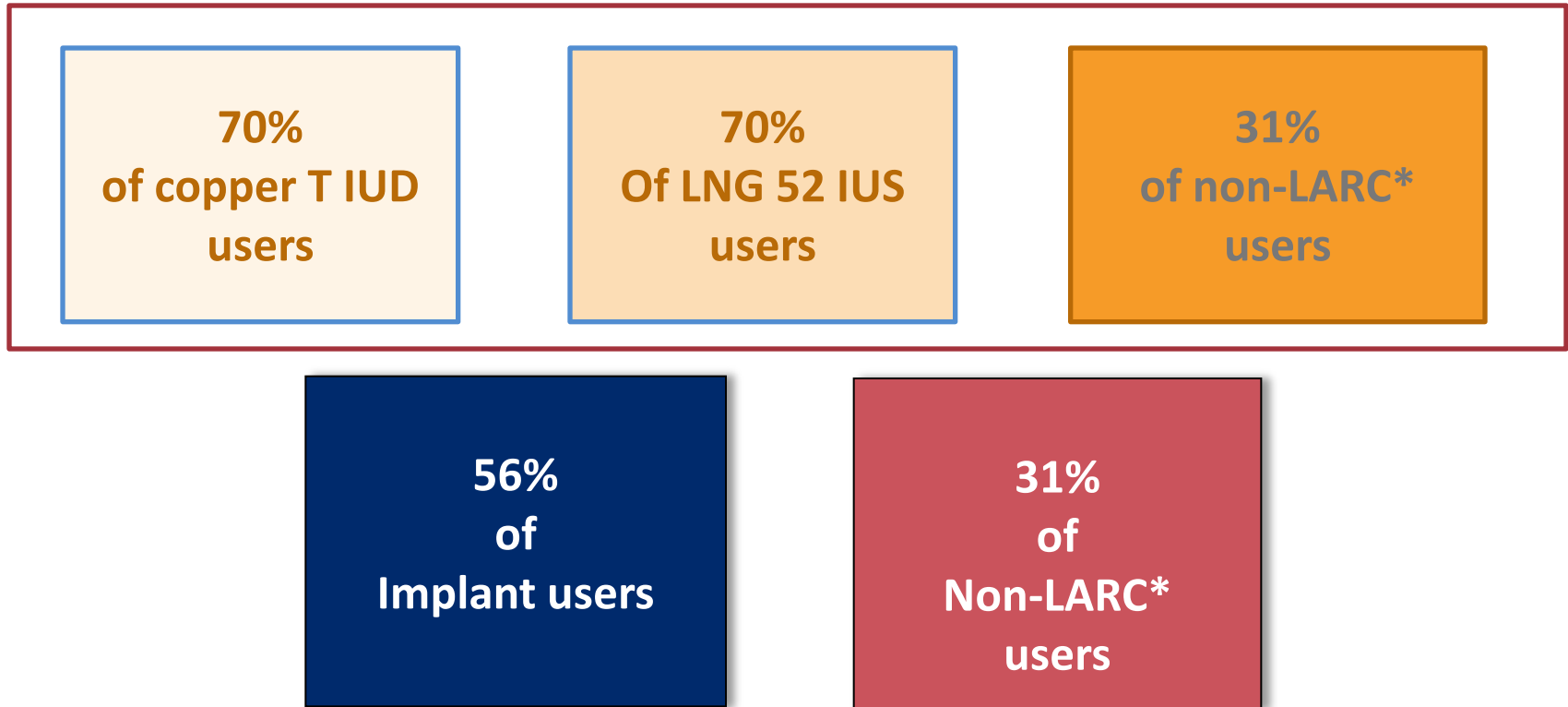
12-24 in 100 women, depending on method

FYI, without birth control, over 90 in 100 young women get pregnant in a year.

LARC Continuation Rates Are the Highest of All Reversible Methods

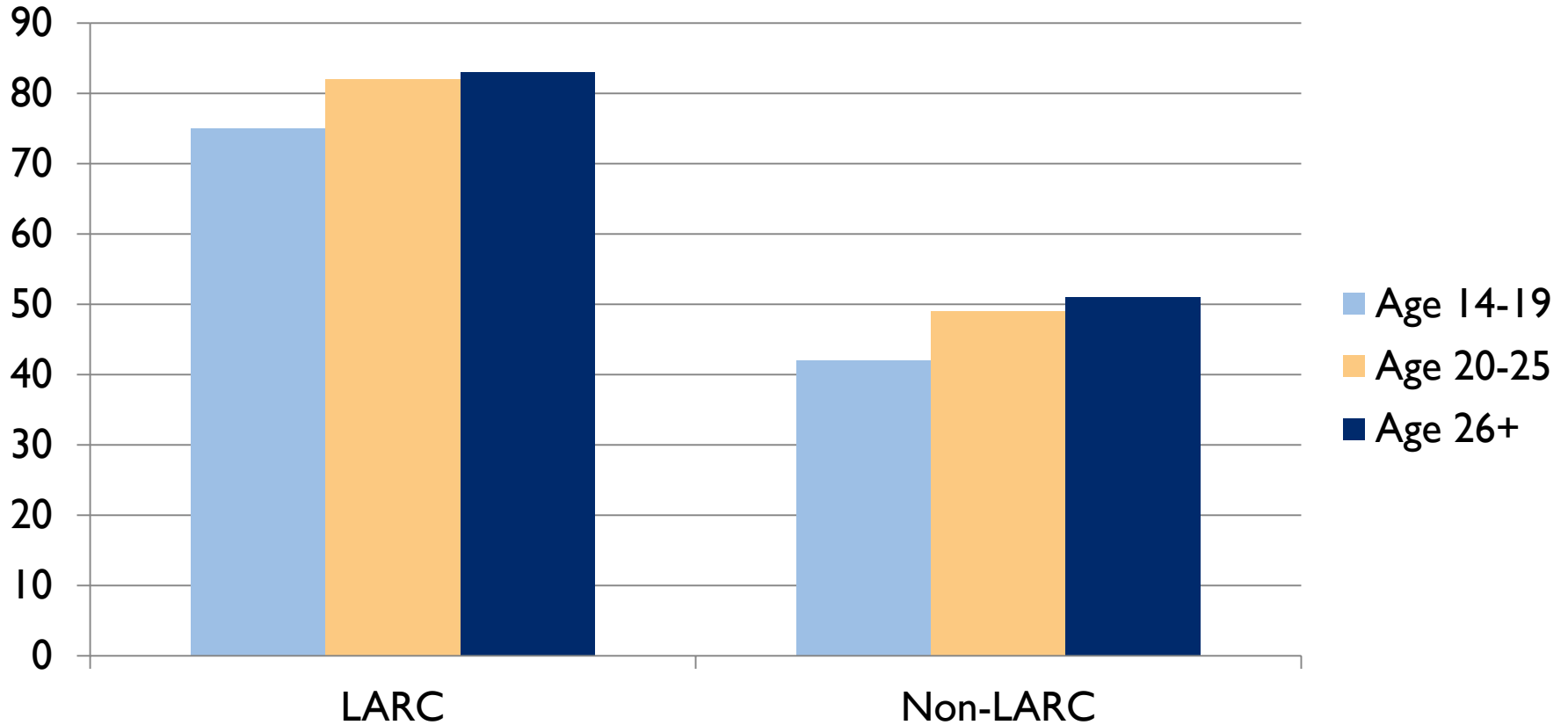


LARC Continuation Rates at 3 Years



***LARC** = long-acting reversible contraception
(non-LARC methods include the contraceptive pill, patch, and ring)

LARC Satisfaction at 1 Year



Counseling for Individual Preferences

Copper T IUD

- Women who don't want hormonal contraception
- Women who want regular periods

LNG 52 IUS

- Women who:
 - want less menstrual flow
 - experience dysmenorrhea
 - have dysfunctional uterine bleeding

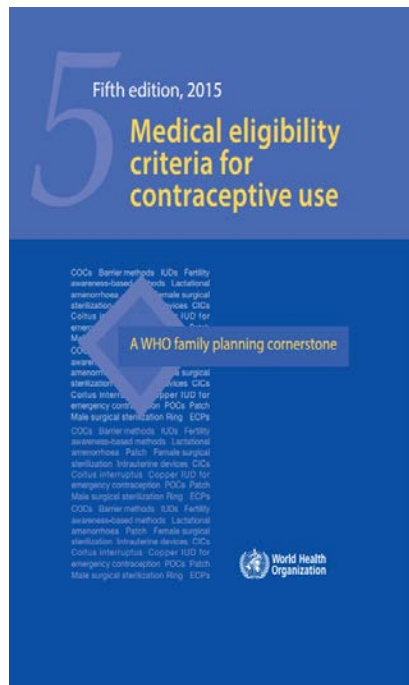
Dispelling Myths About IUC

IUDs:

- **Are not:**
 - abortifacients
 - large in size
- **Do not:**
 - cause ectopic pregnancies
 - cause pelvic infection
 - decrease the likelihood of future pregnancies
 - need to be removed for PID

- **Can be:**
 - used by women who have had an ectopic pregnancy
 - inserted same day
 - started immediately postpartum or during post-abortion care
 - used by nulliparous women
- **Have:**
 - high continuation rates (76 to 87% at 1 year)

WHO Medical Eligibility Criteria (MEC) (comes in the form of an app, wheel and chart)



Category 1: No restriction on use

Category 2: Advantages generally outweigh theoretical or proven risks

Category 3: Theoretical or proven risks usually outweigh advantages

Category 4: Unacceptable health risk

WHO Quick Reference Chart (2015)

CONDITION	Sub-condition	COC	DMPA	Implants	Cu-IUD		LNG-IUS	
Pregnancy		NA	NA	NA				
Breastfeeding	Less than 6 weeks postpartum							
	≥ 6 weeks to < 6 months postpartum				See i.		See i.	
	≥ 6 months postpartum							
Postpartum not breastfeeding VTE = venous thromboembolism	< 21 days							
	< 21 days with other risk factors for VTE*				See i.		See i.	
	≥ 21 to 42 days with other risk factors for VTE*							
Postpartum timing of insertion	≥ 48 hours to less than 4 weeks	See i.	See i.	See i.				
	Puerperal sepsis							
Postabortion (immediate post-septic)								
Smoking	Age ≥ 35 years, < 15 cigarettes/day							
	Age ≥ 35 years, ≥ 15 cigarettes/day							
Multiple risk factors for cardiovascular disease								
Hypertension BP = blood pressure	History of (where BP cannot be evaluated)							
	BP is controlled and can be evaluated							
	Elevated BP (systolic 140-159 or diastolic 90-99)							
	Elevated BP (systolic ≥ 160 or diastolic ≥ 100)							
	Vascular disease							
Diabetes	Nephropathy/retinopathy/neuropathy							
	Diabetes for > 20 years							
AIDS	No antiretroviral (ARV) therapy	See ii.	See ii.	See ii.	I	C	I	C
	Not improved on ARV therapy				I	C	I	C
Drug interactions	Rifampicin or rifabutin							
	Anticonvulsant therapy **							

WHO Selected Practice Recommendations(SPR)

Examination or test Cu-IUD and LNG-IUD*

Breast examination by provider	C
Pelvic/genital examination	A
Cervical cancer screening	C
Routine laboratory tests	C
Haemoglobin test	B
STI risk assessment: medical history and physical examination	A‡
STI/HIV screening: laboratory tests	B‡
Blood pressure screening	C

Class A: Exam/test is mandatory

Class C: Exam/test is not mandatory

Class B: Exam/test is recommended, when feasible in a service delivery context

Source: *Selected practice recommendations for contraceptive use, 3rd Edition*.WHO 2016.

For more information, please visit
www.mcsprogram.org

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