My Birth Control: Engaging patients and providers in shared decision making around contraception

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Our project

- Developed a tablet-based decision support tool (DST), *My Birth Control*, to help women with their selection of a contraceptive method
- Designed to promote a shared decision-making approach to counseling
- Conducted a cluster RCT including 749 patient participants and 28 provider participants in 4 sites in San Francisco
Learning Objectives

• Describe the development of a decision support tool, *My Birth Control*, designed to facilitate shared decision making between patients and providers about contraceptive options

• Discuss the results of a randomized controlled trial of *My Birth Control*, including its effects on informed decision making and patient-centered care

• Understand plans for dissemination
Why develop a decision support tool for contraceptive decision making?
Systematic development process

- Initial **needs assessment** using observation of counseling and qualitative interviews of patients and providers
- Collaboration with **UCSF family planning experts** to synthesize evidence
- Development of a **storyboard and digital prototype**
- Input from patient and provider **stakeholder groups**
- **Cognitive testing** around understandability and user-friendliness
- **Pilot testing** at a safety-net clinic in San Francisco
Structure of the tool

- Educational modules relevant to choice of contraceptive method
- Interactive component where patient indicates preferences
- Health history checklist evaluating eligibility for methods
- Interactive “method chooser” with a method comparison feature
- Questions page where patients can enter their own
- Final printout with methods the patient is interested in, preferences, medical history, and questions for provider

BEFORE WE GET STARTED...
You are going to have a chance to review all the methods, but we know you may already have an idea of which methods you are most interested in. Click on the question mark to learn more about each method (️).

Click below on any methods you know you want to talk to your provider about, so we can keep that information for later.
THINGS YOU MIGHT WANT TO THINK ABOUT / 

As you consider your options, remember that your provider will be there to answer any additional questions and to help you make a good decision. Click on the buttons below to make your way through each section.

- How well does it prevent pregnancy?
- How do I use it?
- How often do I have to remember it?
- Are there any side effects?
- What if I decide I want to get pregnant?

Got Questions?

Keep track of them here and we will make sure that your provider sees them.
HOW WELL DOES IT PREVENT PREGNANCY?

How would you feel if you got pregnant right now? Scared? Stressed? Upset? Click on the methods to see how effective they really are at preventing pregnancy. Knowing which ones work best can help you make an informed decision.

Click the icons below to learn about each method.

[Icons showing effectiveness levels]

No Method: 85 in 100 women will get pregnant during the first year of using no method.
INFO QUICKIE: IUDS

We know some women don’t know much about the IUD, so we wanted to let you know it’s one of the most effective forms of birth control you can get.

- Hormonal and copper IUDs are gaining popularity in the U.S.
- More doctors are recommending them for teens and young women, and using IUDs themselves.

There are also a lot of IUD myths out there, so let’s clear some stuff up.

- IUDs are safe to use, even if you’ve never had a kid.
- They don’t cause infection.
- They won’t keep you from getting pregnant in the future.
- Inserting it into your uterus and taking it out are small procedures done in your doctor’s office. And once it’s in, you don’t have to think about it for years or until you want to have it taken out.

Sounds pretty convenient, right? It is. And how’s this for awesome: IUDs decrease your risk of pregnancy 20 times more than the pill, patch, or ring.
HOW DO I USE IT?

Click to see how each method is used and think about your lifestyle, your body, and how much you want to deal with your method. (Some require more planning and preparation than others.)

BIRTH CONTROL THAT GUYS USE

As you think about birth control, it can be helpful to talk with your sexual partner about your options and preferences. After all, there are a few methods that men can use too.

**Shot**
The shot is just what it sounds like: a shot that keeps you from getting pregnant. You usually get it in your upper arm or hip.

**Vasectomy**
This small, in-office surgery blocks the tubes that carry a man’s sperm. It is permanent, so he has to be sure he doesn’t want to have kids in the future.
**HOW OFTEN DO I HAVE TO REMEMBER IT?**

Click the icons below to learn about how often each method is used. Using your birth control correctly and consistently is extremely important if you don't want to get pregnant. (That means every time, all the time.) It's best to go with a method that you find convenient and easy to use.

<table>
<thead>
<tr>
<th>&lt;&lt; more effort</th>
<th>less effort &gt;&gt;</th>
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</thead>
<tbody>
<tr>
<td><img src="image" alt="Female Condom" /></td>
<td>Use it EVERY time you have sex.</td>
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<th>S</th>
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</table>
ARE THERE ANY SIDE EFFECTS?
Click below to see some side effects and perks that come with using birth control. Remember, most side effects are rare and often get better over time.

**good stuff** | **annoying stuff** | **stuff not to worry about**
---|---|---
In addition to preventing pregnancy, birth control can have positive effects too. Would any of these thrill you?

- **Less Cramping**
  - The pill, patch, ring, shot, and hormonal IUD can all make your periods less painful.

- **Heavy Bleeding**
  - The copper IUD can make you have heavier periods.
A CLOSER LOOK AT SIDE EFFECTS

Now that you know about the potential side effects of birth control, take a closer look and review them by method.

- sterilization
- hormonal IUD
- copper IUD
- implant

- shot
- ring
- patch
- pill

- diaphragm
- male condom
- female condom

**THE PILL**

*good stuff/*

✿ Can make your periods less heavy and less crampy

✿ Can help clear up your acne

✿ Lowers your risk of ovarian and uterine cancer

*annoying stuff/*

✿ For the first few months you may have nausea and breast tenderness.

*stuff not to worry about/*

✿ Unlike what some people think, doesn’t cause depression or weight gain in most women.
WHAT IF I DECIDE I WANT TO GET PREGNANT?

No birth control method will stop you from being able to get pregnant in the future. (Except female sterilization. Remember that one’s permanent.)

Keep in mind that it may take several months or longer to get pregnant after using the shot.

And because the IUD and implant are longer-term methods, we generally recommend them for women who do not want to get pregnant for at least a year. (But you can have them removed and stop using them at any time.)
**NOW WE’D LIKE TO ASK YOU A FEW QUESTIONS**

This will help you identify what’s important to you about your birth control method. By thinking through what matters to you, you’ll be able to find the best fit for you. Select the button to indicate your choice.

**When do you think you might want to get pregnant?**

- Never
- In less than a year
- In a year or more

**How important is it that your method is very effective at preventing pregnancy?**

- Not important
- Somewhat important
- Very important

**Do you care about how often you use your method? (for example every day, monthly, every 5 years)**

- I don’t care
- I care a little
- I care a lot

**When it comes to how often you have to use your method, how do you feel about EACH of these options?**

<table>
<thead>
<tr>
<th>Every time I have sex</th>
<th>Fine either way</th>
<th>Don’t want it</th>
</tr>
</thead>
<tbody>
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</table>

**How much do you care about how the method is used? (for example by mouth, in the vagina, a shot)**

- I don’t care
- I care a little
- I care a lot

**When it comes to how a method is used, how do you feel about EACH of these options?**

<table>
<thead>
<tr>
<th>Love it</th>
<th>Fine either way</th>
<th>Don’t want it</th>
</tr>
</thead>
<tbody>
<tr>
<td>By mouth</td>
<td></td>
<td></td>
</tr>
<tr>
<td>On my skin</td>
<td></td>
<td></td>
</tr>
<tr>
<td>In my vagina</td>
<td></td>
<td></td>
</tr>
<tr>
<td>By shot</td>
<td></td>
<td></td>
</tr>
<tr>
<td>In my uterus</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Under the skin of my arm</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Cutting or blocking of my tubes</td>
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<td></td>
</tr>
</tbody>
</table>

**NOW WE’D LIKE TO ASK YOU A FEW QUESTIONS**

If you tell us how you feel about a few side effects, we’ll start to narrow down methods that might be a good fit for you. (If you have any additional questions about side effects, be sure to ask your provider during your visit.)

**How do you feel about each of the following side effects?**

- Spotting/irregular bleeding
- Not having your period
- Heavier period/cramping
- Weight gain

Sharing your feelings about a few benefits will also help us narrow down methods that might be a good fit for you.

**How do you feel about each of the following benefits?**

<table>
<thead>
<tr>
<th>Fine either way</th>
<th>Would like it a little</th>
<th>Would like it a lot</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
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</tbody>
</table>
HERE’S WHAT WE RECOMMEND

Based on the questions you answered for us, the methods that we recommend for you will appear below. You may have to scroll down to see the whole page. Methods with a check mark (✓) are the ones you said you were interested in at the beginning of the tool. Remember, you can click on the question mark (?) to learn more about each method.

After looking over these recommendations, click on the methods you want to talk about with your provider.

Click to see the methods recommended for you! »

After looking over these recommendations, click on the methods you want to talk about with your provider.

Based on what you told us about the importance of pregnancy prevention to you and if/when you want to get pregnant in the future, the following methods may be a good fit for you:

- hormonal IUD
- copper IUD
- implant

Based on what you told us about how you’d like to use a method and how often you’d like to think about a method, the following methods may be a good fit for you:

- hormonal IUD
- copper IUD
- implant
- shot

Based on what you told us about side effects and benefits, the following methods may be a good fit for you:

- ring
- patch
- pill

Based on what you told us, these methods are not a good fit for your preferences, but you could still consider using them:

- diaphragm
- male condom
- progestin-only pill
- female condom

select methods to continue »

This tool is provided for general informational purposes only and is not intended as, nor should it be considered a substitute for professional medical advice. Do not use the information on this website for diagnosing or treating any medical or health condition. If you have or suspect you have a medical problem, promptly contact your professional healthcare provider. Source of information.
YOUR BIRTH CONTROL PROFILE

Here is a summary of the information you just shared with us. Take it into your visit with your health care provider to start your conversation about birth control.

Methods you want to talk about/

- Hormonal IUD
- Shot
- Pill

When you think you might want to get pregnant/

- In a year or more

How important it is that your method effectively prevents pregnancy/

- Very important

How much you care about how your method is used/

- I care a little
  - Options you’d consider: By mouth, By shot, In my uterus, Under the skin of my arm
  - Options you don’t like: On my skin, In my vagina, Cutting or blocking of my tubes

- I care a lot

How much you care about how often your method is used/

- I care a little
  - Options you love: Every 3 months, Every year or even less often, Every day
  - Options you’d consider: Every month
  - Options you don’t like: Every week, Permanent methods, Every time I have sex

How you feel about possible side effects/

- Spotting/irregular bleeding: Fine either way
- Not having your period: Bothers me a little
- Heavier period/cramping: Bothers me a lot
- Weight gain: Bothers me a little

How you feel about possible benefits/

- Decreased acne: Would like it a lot
- Not having your period: Would like it a little
- Decreased cramping: Would like it a little
- Less heavy periods: Would like it a little

Things your provider should know about your health/

- Blood clots: No
- High blood pressure: No
- Over the age of 35: No
- Smoker: No
- Migraines: No
Evaluation of *MyBirthControl*

- Conducted a cluster randomized control trial of 749 patient participants
  - Clustered at the provider level (n = 28)
- Recruited at 4 clinics in San Francisco
- Developed patient-centered surveys in HIPAA compliant survey system, equipped to assess contraceptive adherence & satisfaction for all methods
Data Collection

• Patient surveys administered at enrollment, 4 and 7 months post-enrollment
• Provider surveys administered pre- and post-intervention
• Tool provider interviews conducted post-intervention
• Tool provider audio-recording visits pre- and post-intervention
• Clinic staff focus groups conducted at each site post-intervention
Outcomes of Interest

• **Primary outcome**
  – Continuation of chosen method seven months post visit

• **Secondary outcomes**
  – Patient contraceptive counseling satisfaction
  – Patient decision conflict in contraceptive choice
  – Patient attitudes and knowledge of contraceptive options and features
  – Patient satisfaction with chosen contraceptive method
Results

• No difference in method continuation at 7 months, between arms
  • 55% intervention vs. 58% control

• Participants who used the tool were more likely to report having experienced patient-centered counseling
  • 66% intervention vs. 58% control
Results

• Greater proportion of patients who used the tool:
  – Indicated complete satisfaction with information received about side effects
    • 83% intervention vs. 76% control
  – Reported making an informed contraceptive choice
    • 51% intervention vs. 43% control
  – Had accurate knowledge about LARC methods
    • 40% intervention vs. 29% control
Additional Outcomes of Interest

• Qualitative assessment of providers’ experiences with patients who used the tool and the feasibility for future implementation

• Quantitative measures of consultation time and total clinic visit time
## Provider Demographics

### Clinical Role / Professional Degree

<table>
<thead>
<tr>
<th>Role / Degree</th>
<th>%</th>
<th>N</th>
</tr>
</thead>
<tbody>
<tr>
<td>Nurse Practitioner</td>
<td>50</td>
<td>14</td>
</tr>
<tr>
<td>Physician Assistant</td>
<td>3.5</td>
<td>1</td>
</tr>
<tr>
<td>Certified Nurse Midwife</td>
<td>3.5</td>
<td>1</td>
</tr>
<tr>
<td>Counselor/Health Educator</td>
<td>43</td>
<td>12</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>100%</td>
<td>28</td>
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</table>

### Age

<table>
<thead>
<tr>
<th>Age</th>
<th>%</th>
<th>N</th>
</tr>
</thead>
<tbody>
<tr>
<td>&lt; 36</td>
<td>52</td>
<td>14</td>
</tr>
<tr>
<td>36-50</td>
<td>29</td>
<td>8</td>
</tr>
<tr>
<td>&gt; 50</td>
<td>19</td>
<td>5</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>100%</strong></td>
<td><strong>27</strong></td>
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</table>

### Racial Identity

<table>
<thead>
<tr>
<th>Identity</th>
<th>%</th>
<th>N</th>
</tr>
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<tbody>
<tr>
<td>Asian</td>
<td>7</td>
<td>2</td>
</tr>
<tr>
<td>Hispanic / Latino/a</td>
<td>28</td>
<td>8</td>
</tr>
<tr>
<td>White</td>
<td>61</td>
<td>17</td>
</tr>
<tr>
<td>&gt; 1 race</td>
<td>4</td>
<td>1</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>100%</td>
<td>28</td>
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Results

• Providers perceived patients who interacted with the tool to have increased knowledge about methods, side effects, and their own preferences
• Enabled providers to allocate their time in counseling more effectively
• Considered intervention to be feasible and indicated they would incorporate into their daily practice
In the words of a provider…

“I think the majority of folks that I worked with came away from using the tool with a much better idea of what they did and did not want because of what they then understood on a baseline level about their different options.”
In the words of a provider…

“[The tool] allowed me to be more targeted in my counseling, as opposed to starting from scratch. I had…a foundation to focus on folks’ preferences and what they wanted to talk about, instead of what providers think clients should know.”
“[Counseling] is better and I’m much more satisfied. I feel like I’ve done a better job because I don’t have to go over that initial information and I have focused information on what she likes, or doesn’t like.”
Results

• There was no difference in total clinic visit time between participants who used the tool and participants who received regular care

• Interviews indicated that intervention providers did not perceive a big difference in counseling time among tool-users
In the words of a provider...

“[The tool] cuts down on counseling time a little bit and it let me focus counseling on what they wanted to talk about versus having to run through the whole gamut of birth control methods and get the foundation layered down.”

“[The tool] made it faster for me to narrow things down for the patients, because they already had in their mind what they really wanted to go over.”
Dissemination of *My Birth Control*

- Planning to disseminate the tool widely across family planning care settings
- Designed to be easily implemented as a web-based, tablet-compatible program
- Collaborating with partners around the country
Thank you

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