

## Red Pill Blue Pill Intervals

Created by Jennifer Sage  
Training Type: HIIT  
Working HR Zones: Zone 4, 5a  
Total Class Length: 60 minutes

### Profile Concept:

The other day I was creating an interval profile that alternated each 3- to 4-minute high-intensity effort as a climb or a fast flat. The intensity was increased either through a slower cadence/higher resistance effort or via a high cadence/lower resistance effort. From experience, I believe most people prefer the climbing intervals.



As I scribbled out the profile in a notebook, I realized that there would be an odd number of intervals, since with the recovery needed and the music I was selecting, I only had time for one more interval at the end. Up to that point I'd alternated the two options. What was the final interval going to be, fast flat or climb? I decided I'd leave it up to my students, and figured I would either take a vote, or do some sort of game that I'd determine in the moment. I had two songs lined up in my playlist, and whatever they chose, I'd skip over the song for the one they didn't choose.

The way I ended up letting my students choose turned out to be quite fun, and was a reference to the movie *The Matrix* (however, my playlist and cueing had nothing to do with *The Matrix*, because I didn't come up with this idea until I was in the moment!). So I decided to turn it into an interval ride in itself, and incorporate a few of the concepts and a few songs of *The Matrix* (although I don't go very deep into it—you can choose to bring more of the theme into your ride if you want to). In fact, even without the Matrix theme, you can use this “game” of choice in many kinds of profiles if you are offering a choice of two things. It's fun, but in a way, it's also a little sinister!

I only used it on my final interval, and you may choose to do that, but for this particular Master Class, I use it on the final three efforts. That way in the first half, you can let them see what each type of interval feels like by doing each one twice. Then you give them more opportunity to be a part of the decision process, although as you'll see, it has an element of chance to it as well.

### The Red Pill or the Blue Pill Choice

This “decision” process involves one person's personal preference, plus another person's ability to thwart that first person's preference through chance.

On the white board at the front of the room, I wrote my profile using a red dry-erase pen and a blue one. I looked in my hands and the red and blue pen caps looked like pills. Bingo! In that moment, I had an idea for how I was going to determine the final interval—they were going to choose the red pill or the blue pill.

First, I gave one student a piece of paper and had her write her personal preference, either “C” for climb, or “FF” for fast flat. Then she folded the paper and held on to it.

Then I took the caps of each pen, a red one and a blue one, and hid one in each hand. I went up to another rider, shuffled the two pen caps behind my back, and put my hands out and asked him to pick one. I told the class:

“If Jamie picks the red pill, then we get to do whatever Nina wrote on that piece of paper. He is agreeing with her choice. However, if he picks the blue pill, then we get to do the one that she did NOT write down! In other words, it nullifies her choice.”

Oh, did they love it!

So, get yourself a blue thingy and a red thingy. A pen cap top works great if you’ve got dry-erase pens. Or use candy, or a marble, or something you create yourself.

### **Bringing in *The Matrix* theme**

In this profile I went a little bit deeper into the Matrix theme, although I didn’t turn it into an epic theme ride. Scott Schlesinger, Master Instructor for the Spinning® program, has an epic master class called The Matrix Ride. This profile is nothing like Scott’s, whose entire ride is focused on the themes from the movie and commitment to your choices (if you ever have a chance to experience his Matrix ride, don’t miss it). I focus more on the physiological aspects of the intervals, and the fun means of choosing the final three intervals via the red pill/blue pill. You can research the movie yourself if you want to bring in more of its concepts, or perhaps you are already a Matrix geek and know everything about the movie. But just in case, here is the description of the red and blue pills from Wikipedia:

The blue pill and its opposite, the red pill, are pop culture symbols representing the choice between the blissful ignorance of illusion (blue) and embracing the sometimes painful truth of reality (red).

The terms, popularized in science fiction culture, derive from the 1999 film *The Matrix*. In the movie, the main character Neo is offered the choice between a red pill and a blue pill. The blue pill would allow him to remain in the fabricated reality of the Matrix. The red pill would lead to his escape from the Matrix and into the "real world."

### **Objective and Intensity**

The idea behind these intervals is to push hard to threshold for 2 minutes, then push even harder above threshold to breathless for 1 to 1-1/2 minutes more. In the first half of the class, high-cadence fast flats are alternated with climbs. In the second half, you have three more intervals, but they are chosen via the red pill/blue pill method.

The physiological objective of this two-step interval is to challenge the body's ability to tolerate the additional acid at those higher levels (anaerobic). This is a situation that a cyclist might find herself in if she is pushing steadily at around threshold, but has to overcome a much harder effort by pushing above threshold. It could be on a mountain bike on a climb that suddenly becomes really challenging, or on a flat road ride in a peline, trying to bridge a gap or to attack.

Always remember, it is very important to drop the heart rate to Zone 1 during the recovery so the rider is fully prepared for that extra effort in the subsequent intervals.

## **The Warm-up**

### **Song #1: The Eyes of Truth, Enigma, Cross of Changes, 96 bpm, 7:15**

As you begin your warm-up:

*Who wants to do an interval ride? Everyone? Great, because that's what I've got up my sleeve for you today. However, you'll find out a little later that it has a twist to it, and I'm going to ask for some interaction from you all. In the second half of class, you are going to step into the Matrix. Or out of it, as the case might be.*

*But let me tell you about the interval efforts first. Basically you'll push to "hard," which will be right at your threshold, and hold for 2 minutes. Then you'll push to even harder, 4–6 beats above threshold, right around breathless, and hold for a minute, sometimes 90 seconds depending on the song, and as we progress. Then you'll recover for 3–4 minutes. I need you to really let yourself recover, because otherwise you won't have what you'll need for the next interval.*

*The first will be a fast flat. Because it's the first interval, as you know, your body may not quite be ready, so you're not going to use your heart rate as the initial guide for the effort. Instead, you'll use perceived exertion, and see where your heart rate gets to. Once you've done one, your body will be better prepared, and you can use your heart rate monitor to help guide you to threshold on the subsequent ones, along with perceived exertion.*

*The second interval will be a climb. Then we'll alternate the next two.*

At 4:00, it is the part of the song that is used in the trailer for the movie *The Matrix* (note that this song doesn't appear on the soundtrack, however).

*Hear that? Sound like The Matrix? Well, that's where we are going. That's when the fun stuff starts, when I'll need your input about the intervals in the second half. I'll tell you more about that as we get closer, but you'll have to decide whether you want to accept blissful ignorance or the painful truth of reality. You are going to have to make a choice: do you want the red pill or the blue pill?*

*But for now, I need you to add just a little more resistance as your legs warm up and you can take on a little more.*

Guide them through the warm-up, using a few leg surges if desired. As you get close to the first interval tell them:

*Remember, this first one is an extension of the warm-up. It's a fast flat to 96 rpm. You can stand for the first 15 seconds if you want, but most of it should be in the saddle. Faster legs often raise the heart rate more than climbs, but make sure you have resistance on the flywheel. You'll hold for 2 minutes total. Then you'll increase your gear a little bit, and sit and push through the challenge until a minute is over. Then we recover. Most of the songs are a little over 6 minutes to 7 minutes. You'll use the first half of the song to work, and the second half to recover. Ready?*

**First Interval—fast flat****Song #2: UFO Over Trenchtown, Eat Static, 96 bpm, 6:28**

*Stand for the first 20 seconds to bring up the heart rate, but not necessarily to the speed of the song (standing is optional). Once you sit back down, grab that beat, bring the leg speed up to match the rhythm of the song. Use a gear where you can feel a challenge and bring the heart rate up, but that doesn't slow the legs down.*

Hold for 2 minutes. They'll need your support to keep them from going too hard or from slowing the legs down. Remember, during the first interval their heart rate may not rise to threshold.

After 2 minutes:

*Ready for the next challenge? Stay seated and turn up the gear; hold for 1 minute. Yes, you'll probably get to breathless, but this early, the heart rate may not reflect what you normally expect for breathless.*

After a minute, ease up, but ask them to notice where their heart rates were at the end. Use the remaining 3-1/2 minutes to recover. They can slow their legs if they want. Let them know that subsequent intervals they'll most likely have more control over their heart rates and should be able to dictate where it goes more than the first or second one. Everyone is different in how long they take to warm up and respond to higher intensity.

As you get close to the end of the song, get them ready for the next one, which is a climb at 65 rpm.

**Second Interval—climb****Song #3: Go (Woodtick Mix), Moby, Go Remixes, 130 bpm, 6:33**

*Here we go! Turn it up enough to stand up and support your body weight.*

After 30 seconds:

*Sit back down and hold; you may have to fine tune the gear but keep that cadence. Most of you should reach threshold by the end of the 2 minutes.*

After 2 minutes

*Let's take it up a notch, stand up for 30 seconds...*

*Alright, sit back down. You should really feel this challenge; you should be breathing very deeply, but not gasping. We are only a few heartbeats above threshold.*

After the minute is over, ease up and tell them:

*Great job. Notice where your heart rate got to this time; were you able to target it better?*

*Ease up, bring your heart rate back down, and ride at whatever cadence you prefer.*

*Remember, these recoveries are going to become every bit as important as the work so take advantage of them.*

Just before the song ends, tell them that the next one will be a fast flat.

**Third Interval—fast flat****Song #4: Undubstand, Blackfeet, 93 bpm 7:27**

*I think you know what to expect now, right? Bring the cadence up there, and dial in that road, enough to make it challenging. Stay seated. Hold the cadence. Accept this challenge.*

At 2 minutes:

*Now comes the hard part. Reach down and turn it up a little, something that might represent one gear on your bike outside, or that feels like a headwind. But keep those legs locked on to that rhythm. You're going to hold it for 90 seconds. Yup...that's hard, I know! Dig in. You can do this.*

Then ease up and recover. Use the remaining time in the song to bring the heart rate down and relax.

**Fourth Interval—climb****Song #5: Zion, Fluke, Matrix Reloaded, 127 bpm, 4:34**

*We are about to enter the Matrix! You movie buffs should recognize this song. It takes a while to get going but when it does, we are going to attack this hill in two steps. So get ready to rock it... This one is 63 rpm.*

At 1:02 into the song, add resistance and stand up for 30 seconds.

*And here we go!*

After 30 seconds:

*Sit back down and level off your intensity at your threshold. Don't surpass it...yet. In the Matrix, you will need your wits about you; you need to be in control.*

Let them know that the harder effort is going to be 90 seconds this time, so they'll have to monitor their intensity accordingly. Don't go so hard that they can't keep the effort for 90 seconds.

*It's time! Stand up again, turn it up, and take yourself to breathless. Hold here for 45 seconds. Your legs might be calling out to you, I want you to call right back at them and say, "I hear ya! Hold on there! I know you can do it!"*

After 45 seconds, bring them back down to a seated climb and push hard for another 45 seconds.

**Recovery****Song #6: Saint Matthew Passion, E.S. Posthumus, Makara, 70 rpm, 3:38**

While they are recovering, you'll explain the *Red Pill/Blue Pill*.

*So, now you know what your options are as far as intervals go. We've got three more to do. But...since we have entered the Matrix, you are now in a scenario in which you have to decide if you are going to make the choice of the blissful ignorance of illusion, in this case the personal preference of you, or someone amongst you, to do a flat or a climb, or if you will be forced back into the painful truth of reality—which may not be what you really want.*

*Here is how we are going to do them. During each recovery, I'm going to pick one of you to write down what you prefer to do, either a climb or a fast flat. Just write a "C" or "FF" on this index card.*

Give a piece of paper or index card and pen to one of your students, have him or her write their preference, and ask them to fold it up and hold on to it so no one can see it.

*Great. Mary has made her choice. It's what she really wants to do next. So now you're thinking our next interval is whatever Mary decided she wants to do, right? Well, maybe it is, but maybe not. Because what if there's more to existence? See here, in my hands I have a red pill and a blue pill. I'm going to mix them up, and then have one of you select one of my hands. Bill, you be the decider for this part. The red pill represents the blissful ignorance of illusion, which is accepting Mary's choice. If Bill picks the hand with the red pill, then we get to do whatever Mary decided. On the other hand, the blue pill represents the painful truth of reality, which might mean you don't always get what you want. So, if Bill picks the blue pill, then that will be a tough pill to swallow, because it means that we do the OPPOSITE of what Mary wrote down!*

*Bill, pick a hand!*

Hold your hands out in front of you, and when he selects, turn it over for everyone to see. Go ahead and be dramatic about this! If he selects red you can say:

*Mary, read what's on your paper. Climb? How did I know that's what you would pick? Well, this time you got away with it, we all get to do what Mary prefers!*

If he selects blue you can say:

*Mary, read what you wrote down. Ahhhhh, I'm sorry. I kind of thought you would select a climb, but guess what...you don't get what you want today, that's the way these things work out sometimes. Guess we'll all do a fast flat again. You can blame Bill if you want! (And then wink at them.)*

Obviously, the remainder of the class is going to be entirely dependent on what your students pick, so I won't continue with cues for each song, but here are some additional tips for coaching this profile.

You'll need 6 songs lined up in your playlist, 3 for climbing and 3 for fast flats. Two of those songs should be 6–7 minutes so you have a total work effort of 3 to 3-1/2 minutes (2 minutes at threshold, 1 to 1-1/2 minutes above threshold), plus have the second half of each song to recover. Your final song for each type of terrain will be around 3-1/2 to 4 minutes long, and will be the final interval song you'll play because you won't need the time after to recover, you can just move into the cool-down song.

During the recovery portion of each song, you'll go through the selection process again, with one student writing down a preference, and then another student picking the red or blue pill. Keep the drama high as you go through this process. You will have to then cue up your next song

accordingly. (Note: This won't work as well with CDs!) Hopefully with the element of chance thrown in there, you will have two of one type of terrain and one of the other. But it's possible that you'll end up doing all three intervals of the same terrain. That's OK! That's what makes this so fun, and every single time you do this it will be different. You can really have fun with your music selection as well, changing it up each time.

Here are some additional cues in case you end up with all three intervals being the same thing. When you have three climbs in a row, when the final interval is chosen as a climb:

*Can you believe it? Another climb! I bet you guys wanted climbs so much that you used mental telepathy to make it come out like this, right? Well, I guess we're climbing again, and I want you to celebrate by going really hard on the second part of this final interval. But you never know—our next class might be all fast flats as compensation! The Matrix might follow us into next week's class. (wink, wink)*

Or, three fast flats in a row, after the final interval is chosen as a flat:

*Really? You guys love these fast flats that much? Wow, I'm impressed. I know I keep telling you how powerful they are for training your aerobic system and your leg speed. I also know that some of you don't like them as much, because they take so much more mental focus, and because fast legs are just plain hard. But I guess that is our lot today, eh? Today is destined to be a mental focus day, working on those faster leg speeds at threshold and above. Here we go, another fast flat interval. You asked for it, you got it!*

### **Cool-down**

#### **Song #10: Moonlight Sonata, E.S. Posthumus, Makara, 5:30**

*Thank you all for your input into this great ride. It's because of you that it was so much fun. When you go home, you can decide if you want reality or ignorance!*

Cool down and stretch, and enjoy the thumbs up from your students!



# Red Pill Blue Pill Intervals

## Quick Profile

Created by Jennifer Sage

Training Type: HIIT

Working HR Zones: Zone 4, 5a

Total Class Length: 60 minutes

### Warm-up

An interval ride with 7 intervals of 3 to 3-1/2 minutes. 2 minutes at threshold intensity, and 1 minute to 1-1/2 minutes above threshold (breathless). Songs are 6–7 minutes long, alternating a climb with a fast flat of 90–105 rpm. After the work effort, ease up and recover during the remainder of the song, for at least 3 minutes or a little longer.

### First four intervals

The first 4 intervals are instructor's choice. Begin with a fast flat (noting that on the first interval they may not get to threshold). Second interval is a climb. Third is a fast flat, the fourth is a climb.

### Red pill blue pill intervals

For the remainder of the intervals (3 more), you'll have your students help decide, although there is an element of chance as well.

Have one student write down their preference on a card, climb or flat, and fold it in half and hold on to it. Then take your red and blue "pills," mix them up behind your back, and ask another student to select one of your hands as you hold them out in front. If it's a red pill, then you get to do what the first student wrote on the card. But if it's a blue pill, you have to do the opposite of what they wrote. Continue this for the final three intervals. Cue your songs up in your playlist so you can easily select the song that corresponds to their choice on your mp3 player.

### Cool-down/Stretch

## Red Pill Blue Pill Interval Playlist

When choosing your songs, you may have to make sure that you don't go over your allotted time for class, since there is an element of chance to the songs. Do this by making sure most of your song options for the final three intervals are close to 6-1/2 minutes. It's possible that one can be longer and still fit (I have a few 7-minute suggestions). Try making a sample playlist in iTunes with the first half of the pre-selected songs, then add a sample of the longest songs from your "red pill blue pill" options to make sure you don't go over an hour. Or you can use MixMeister to make sure they are all about the same length. If you have a time slot less than an hour, you may have to do only two options for the red pill blue pill intervals.

### Song title/artist/album/bpm/length

**Warm up:** The Eyes of Truth, Enigma, Cross of Changes, 96 bpm, 7:15

### **First Interval—fast flat 2 min @ LT, 1 min > LT. Then recover to end of song**

UFO Over Trenchtown, Eat Static, New World Dub, 96 bpm, 6:28

### **Second Interval—climb 2 min @ LT, 1 min > LT. Then recover to end of song**

La Aurora, Feuerhake, Excess All Area, 140 bpm, 6:12

### **Third Interval—fast flat 2 min @ LT, 90 seconds > LT. Then recover to end of song**

Undubstand, Blackfeet, Dub Cat, 93 rpm, 7:27

### **Fourth Interval—climb 2 min @ LT, 90 seconds > LT. (Wait until 1 min into the song to start)**

Zion, Fluke, Matrix Reloaded, 127bpm, 4:34

**Recovery song:** Saint Matthew Passion, E.S. Posthumus, Makara, 140 bpm, 3:38

### **Possible red pill/blue pill climbing intervals (choose two of these)**

Go (Woodtick Mix), Moby, Go Remixes, 130 bpm, 6:33 (interval total 3:15)

Human (Pink Noise Dub), The Killers, Human Remixes, 132 bpm, 7:09 (interval total 3:30)

12, Tilt, Creamfields Blue, 134 bpm, 6:32 (interval total 3:15)

Q'Elf, Akhentek, Entheos Audio Archive 2.0, 140 bpm, 7:19 (interval total 3:30)

### **Final red pill/blue pill climb is 3-1/2 to 4 minutes (choose one of these):**

My Lucky Day, Bruce Springsteen, 140 bpm, 4:00 (2 min @ LT, 2 min > LT) (You can make a joke about this being their lucky day to end on a climb!)

Tikal, E.S. Posthumus, Unearthed, 130 bpm, 3:36

Easy, (Infinity Waits), K-X-P, II, 133 bpm, 3:57

Know Your Enemy, Green Day, Know Your Enemy, 130 bpm, 3:13 (You can mention that in the Matrix they need to know who the enemy is, you never know who might betray you.)

### **Possible red pill/blue pill fast flats (choose two of these):**

Wheels of Fortune, Koan, 95 bpm, 6:19

Dorset Perception (Deep Dive Corp. Remix), Shpongle, 90 bpm, 6:24

Submission (Original Mix), SpectraSoul, Submission/Tender Doubt, 87 bpm, 6:26

Walk Away (Side Liner Remix), Percussion Bullet, Future Accommodation, 100 bpm, 6:37

Royksopp's Night Out, Royksopp, Melody A.M., 102 bpm, 7:30

### **Final red pill/blue pill flat is 3-1/2 to 4 minutes (choose one of these):**

This is Your Life, The Killers, Day and Age, 100 bpm, 3:41

Jump Around, House of Pain, Ready to Rumble Soundtrack, 106 bpm, 3:37 (a little faster, but fun)

Drumming Song, Florence + The Machine, Lungs, 100 bpm, 3:44

Viva La Gloria, Green Day, 21<sup>st</sup> Century Breakdown, 95 bpm, 3:48

**Cool Down:** Moonlight Sonata, E.S. Posthumus, Makara, 5:30