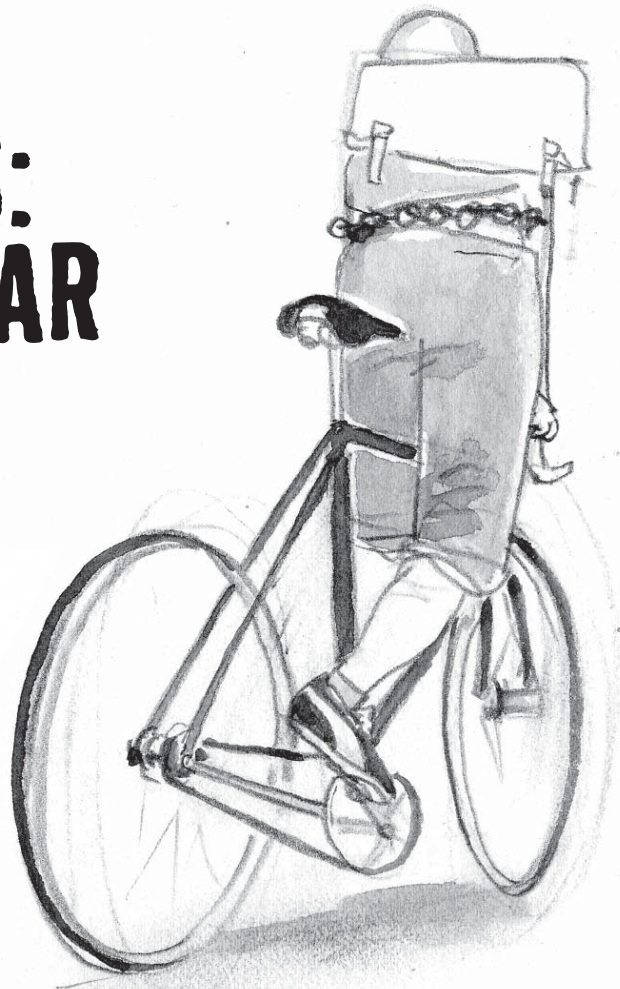


**PUMA
PRESENTS:
FIXED-GEAR
101**



RIDING FIXED: AN INTRODUCTION

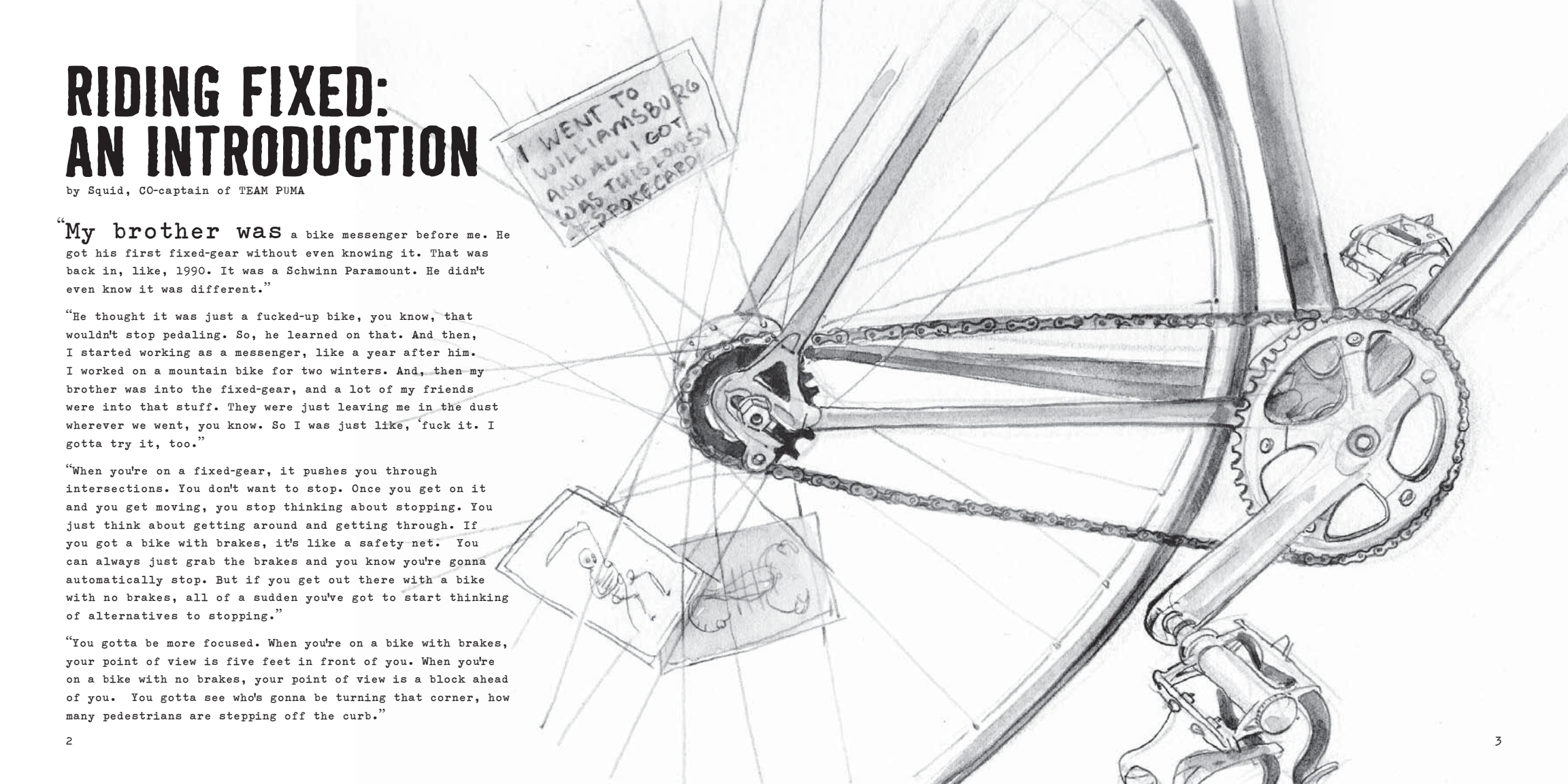
by Squid, CO-captain of TEAM PUMA

“My brother was a bike messenger before me. He got his first fixed-gear without even knowing it. That was back in, like, 1990. It was a Schwinn Paramount. He didn't even know it was different.”

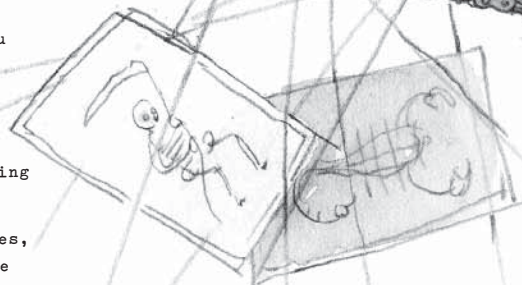
“He thought it was just a fucked-up bike, you know, that wouldn't stop pedaling. So, he learned on that. And then, I started working as a messenger, like a year after him. I worked on a mountain bike for two winters. And, then my brother was into the fixed-gear, and a lot of my friends were into that stuff. They were just leaving me in the dust wherever we went, you know. So I was just like, ‘fuck it. I gotta try it, too.’”

“When you're on a fixed-gear, it pushes you through intersections. You don't want to stop. Once you get on it and you get moving, you stop thinking about stopping. You just think about getting around and getting through. If you got a bike with brakes, it's like a safety net. You can always just grab the brakes and you know you're gonna automatically stop. But if you get out there with a bike with no brakes, all of a sudden you've got to start thinking of alternatives to stopping.”

“You gotta be more focused. When you're on a bike with brakes, your point of view is five feet in front of you. When you're on a bike with no brakes, your point of view is a block ahead of you. You gotta see who's gonna be turning that corner, how many pedestrians are stepping off the curb.”



I WENT TO
WILLIAMSBURG
AND ALL I GOT
WAS THIS LOOPY
BICYCLE CARD!

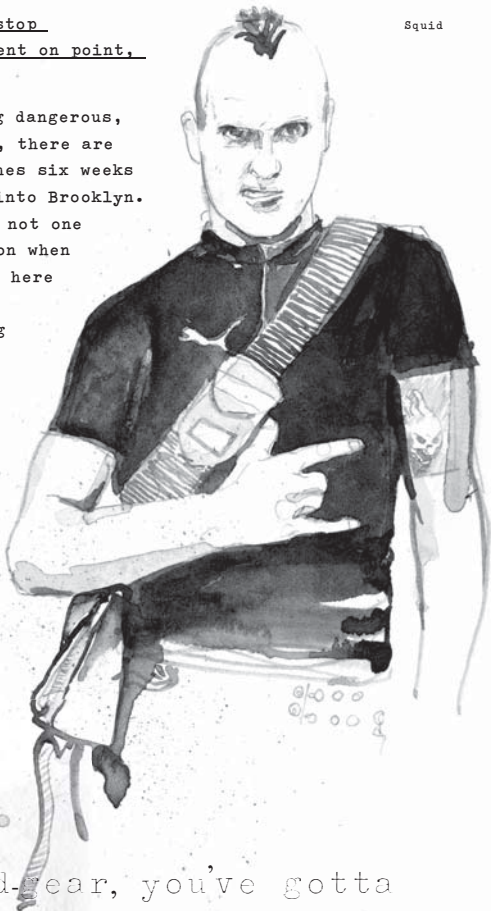


"It changes your whole scenario. When you can't stop automatically, you've got to be one hundred percent on point, and paying attention."

"It's really simple, but it can be really fucking dangerous, too, if you're not paying attention. In New York, there are always a lot of moving things. I got nine stitches six weeks ago. Coming off the Williamsburg bridge coming into Brooklyn. It's the kind of shit that can happen when you're not one hundred percent focused. I wasn't paying attention when I was riding my bike. It's all about being 'right here right now.' If you're focused, you can deal with anything. If you're not paying attention, fucking pizza, man. It's all about paying attention."

"When I started riding fixed-gear, I was a menace, like crashing into stuff. All over the place. But, my motivation was to be able to keep up with my brother and the crew. So, I was just going for it. Was like, "I'll stop—aahhh!" And crash into the back of something—that's how I'd stop, you know? I'm not going to hate on anyone that's doing that, cuz I did it, too."

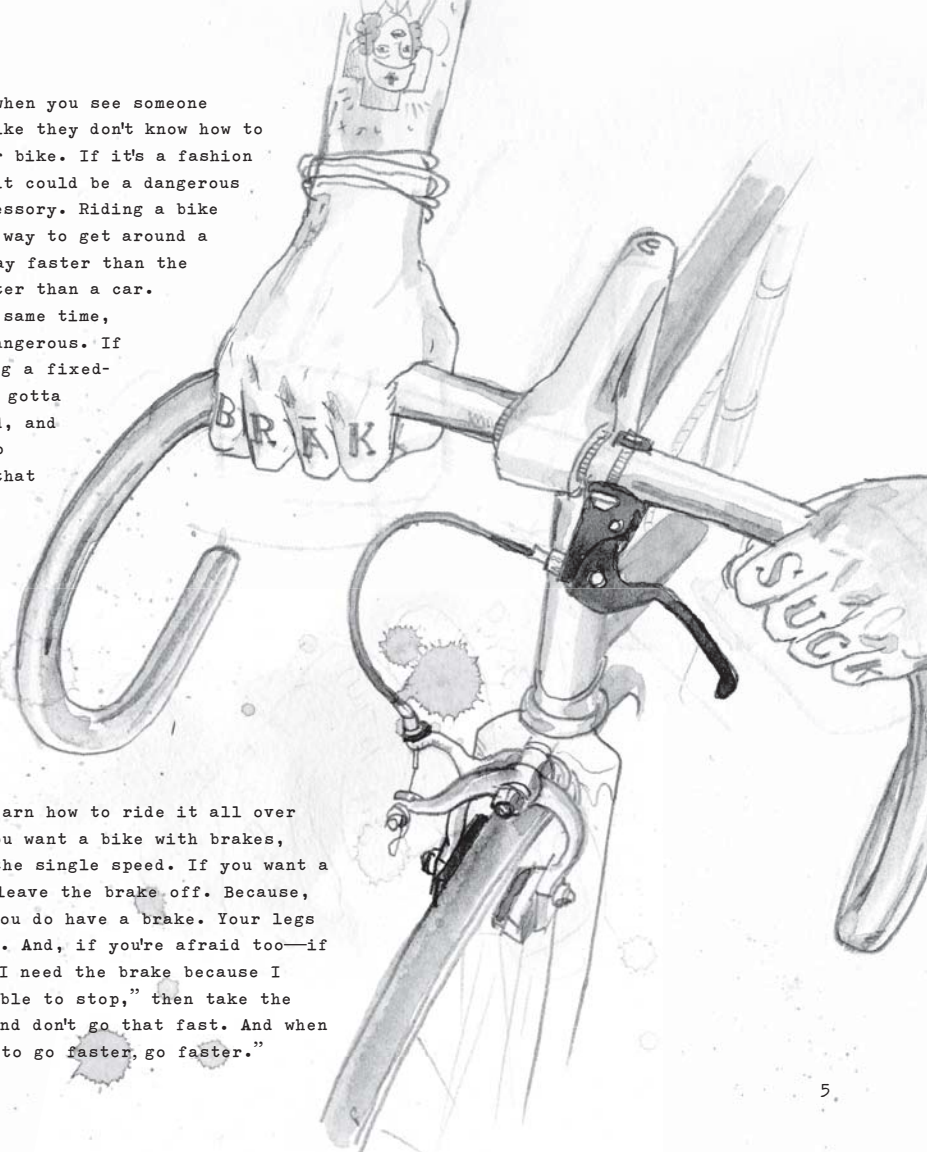
Squid



"If you're riding a fixed-gear, you've gotta be dedicated, and you've got to understand that it can be dangerous out there."

"It's scary when you see someone who looks like they don't know how to handle their bike. If it's a fashion accessory, it could be a dangerous fashion accessory. Riding a bike is the best way to get around a city. It's way faster than the subway, faster than a car. But, at the same time, it can be dangerous. If you're riding a fixed-gear, you've gotta be dedicated, and you've got to understand that it can be dangerous out there."

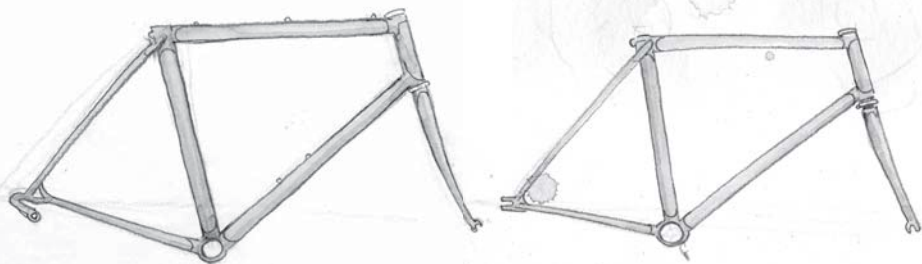
"If you learn how to ride with the brake, then you take the brake off, you gotta learn how to ride it all over again. If you want a bike with brakes, stick with the single speed. If you want a fixed-gear, leave the brake off. Because, literally, you do have a brake. Your legs slow it down. And, if you're afraid too—if you think, "I need the brake because I want to be able to stop," then take the brake off, and don't go that fast. And when you're ready to go faster, go faster."



FIXED GEAR 101: GETTING STARTED

by Dave Pendon

START WITH THE FRAME



So, past all the romanticized metaphors of “an extension of your body” and “connected to the road” stuff. First thing you’ll need is a frame.

Dave lives in Montreal and is a bike messenger by day. By night he builds custom track frames.

DROPOUTS



YOU’LL NEED:

- a shorter wheelbase (axle distance between wheels),
- steeper head and seat tube angles (the closer to vertical, the more responsive the ride)
- a higher “bottom bracket” (the horizontal axle that your crankarms and pedal spin around). You’ll be pedaling through corners so you need pedal clearance.

Probably the most appropriate frame is a 70’s-80’s era road bike, otherwise known as a “12-speed” or “racing bike”. Most of the time the higher end the better as higher end bikes of this period had more of a racing geometry.

To find a bike that fits, measure your inseam from the floor to your pubic bone. Take 2/3rds of that measurement, and that should equal the seat tube length of the

frame you will need (the tube directly underneath the seat).

The one requisite of the frame is horizontal dropouts. Without a derailleur to tension the chain, the wheel must be able to slide front to back in order to tighten up the slack in the chain.

Two other types of bike have horizontal dropouts, the English 3-speed and cruiser. However, these are not worth converting, as the bottom bracket is so low, you’ll be scraping your pedals on every street corner, plus the geometry is too laid back and very, very sluggish.

Once you have a frame, the necessary modifications will be;

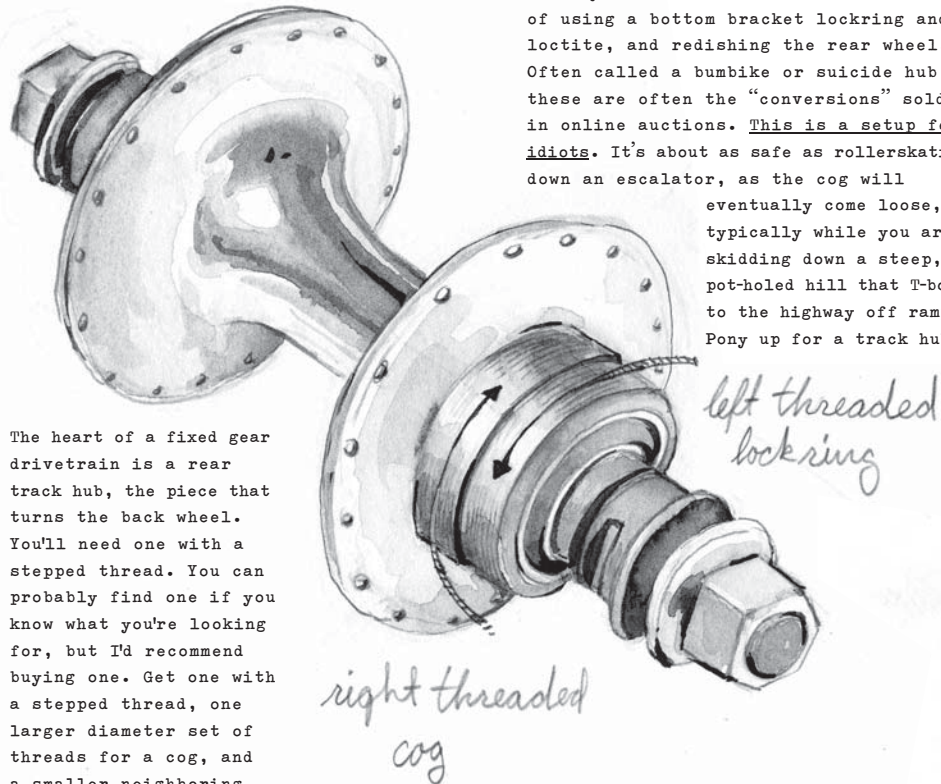
1. adding a new rear track wheel or hub
2. adding a track cog
3. adding a track chain
4. maybe adding a bottom bracket axle

TRACK HUB

rim to the new hub, or you can go all out and replace the rear wheel.

You may hear talk of a super cheap method of using a bottom bracket lockring and loctite, and redishing the rear wheel. Often called a bumbike or suicide hub, these are often the "conversions" sold in online auctions. This is a setup for idiots. It's about as safe as rollerskating down an escalator, as the cog will eventually come loose, typically while you are skidding down a steep, pot-holed hill that T-bones to the highway off ramp. Pony up for a track hub.

The heart of a fixed gear drivetrain is a rear track hub, the piece that turns the back wheel. You'll need one with a stepped thread. You can probably find one if you know what you're looking for, but I'd recommend buying one. Get one with a stepped thread, one larger diameter set of threads for a cog, and a smaller neighboring reverse set for a lockring. If the bike you're using came with a decent rear wheel you can have your local shop lace the old



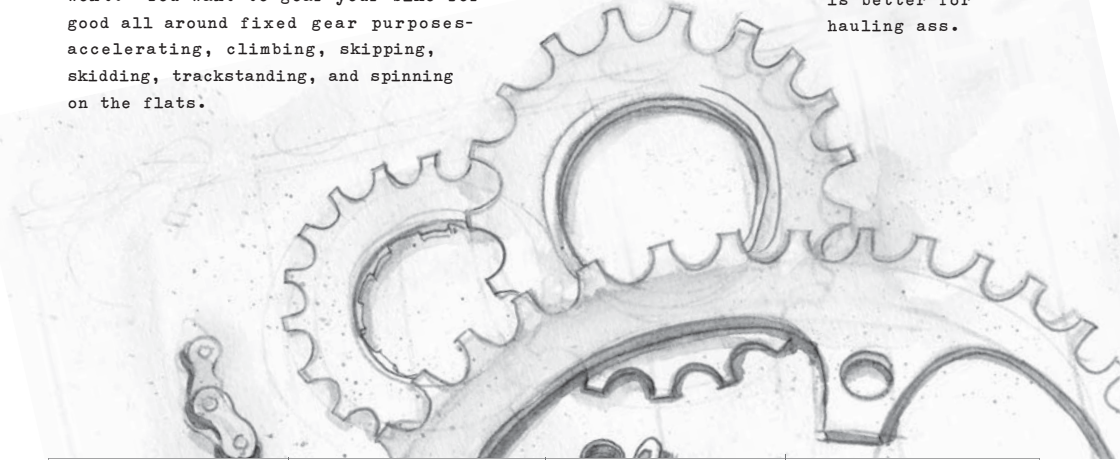
GEARS

Take off the derailleurs, shift levers and rear brake (if you want to).

The crankset you have probably has two chainrings. I'd recommend using the smaller of the two, which will be a 39-42 tooth.

Like any other sports equipment, don't think that you're all pro at first and slap a huge gear (like 90 inches) on there. It'll be really hard to stop - or you just won't. You want to gear your bike for good all around fixed gear purposes- accelerating, climbing, skipping, skidding, trackstanding, and spinning on the flats.

A good ballpark for your gear combination, should be in the high 60's or low 70's of gear inches. Depending on the size of your chainring, choose an appropriate cog. Your track-friendly bike shop selling you the hub and cog will also be able to give you a good recommendation of the appropriate gearing for your turf. A lower gear (lower number ie; 67inches) will be easier to climb with, easier to flip into a skid, and easier to trackstand with. However on downhills a lower gear will "spin out" easier. In general, a higher gear is better for hauling ass.



	39t CHAINRING	40t CHAINRING	42t CHAINRING
14t COG	73.2 gear inches	75.1 gear inches	78.8 gear inches
15t COG	68.3 gear inches	70.1 gear inches	73.6 gear inches
16t COG	64.1 gear inches	65.7 gear inches	69.0 gear inches

HANDLEBARS

Handlebars are the most notable “modification” to the original bike. Any style will work fine. They all have their advantages;



PISTA BARS OR TRACK DROPS

They have almost no flat on the bar tops. They round out & down right out of the stem (so you don't bang your forearms while you're sprinting). The bars feel great while you're down low, but they take a bit of getting used to in all other positions. These bars complete the classic trackbike look, with the sole purpose of going all out in the sprints.



ROAD DROPS

These are pretty much the same as pista bars, but have better bar top hand position. They aren't quite as sexy, but more functional. Easier to work with when you're running a front brake with a BMX lever. They're also easier to find.



BULLHORN BARS

These bars have a great all round hand position, and are great for skidding, skipping and tricks. The look is more tech and new school than classic and retro. You can buy a set or make yourself a pair by flipping and cutting a set of road drops (if you're on a budget).



MOUNTAIN BIKE HANDLEBARS

They are also called RISER AND FLAT BARS and have a great all-round hand position and a similar feel to bullhorn bars, with a position a bit more set back.

Handlebars are the most notable “modification” to the original bike.

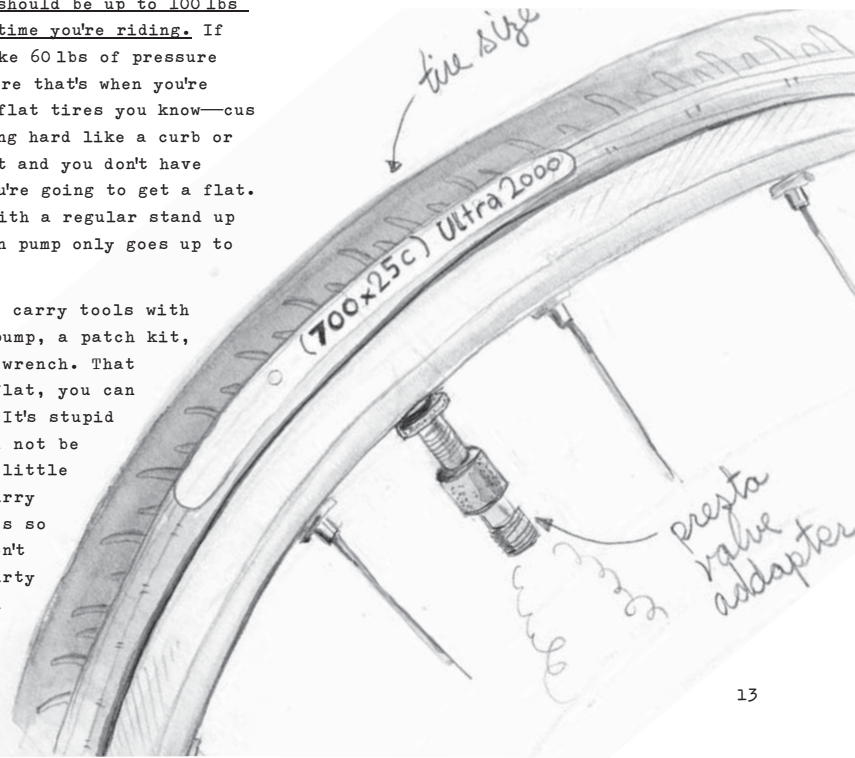


WHEELS

by Squid

“You got to have good wheels. Deep dish rims are better than box rims. The deep dish rims make city riding so much better. They build a stiffer wheel so they'll hold their true longer. Keep your tire pressure up, that's really important. You should pump your tires up every two or three days. They should be up to 100lbs of pressure every time you're riding. If you're riding on like 60lbs of pressure or 80lbs of pressure that's when you're going to get your flat tires you know—cus if you hit something hard like a curb or something like that and you don't have proper pressure you're going to get a flat. You're better off with a regular stand up pump. A gas station pump only goes up to 80 lbs.”

“You should always carry tools with you too, carry a pump, a patch kit, tire levers and a wrench. That way if you get a flat, you can fix it yourself. It's stupid to have a bike and not be able to fix it. A little bit of stuff to carry with you that makes so much sense, you don't want to go to a party and get a flat and have it ruin your whole day.”



TOE CLIPS

"You've got to have toe clips. I know people who ride without them. But they're crazy." - Squid

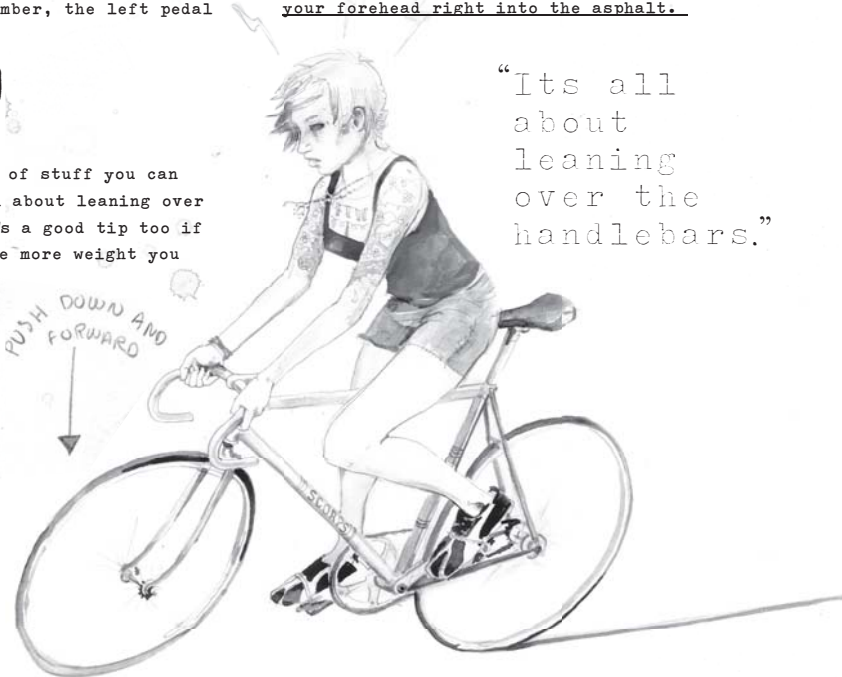
With your new bike's drivetrain ready to roll, you'll need to fine tune your setup. If the bike's pedals have holes for toe clips, install a set with nylon straps. If the pedals are not made for clips, get ones that are. Remember, the left pedal

is reverse threaded. While they have a nice vintage feel, stay away from simple leather straps. The reinforced ones made for track racing are great, however with the cheap econo ones, the leather wears out very quickly and has a tendency to snap. Some people like to double up the straps on the foot they favour when pulling up to brake.

And keep those shoelaces really well tucked in. If a right-side shoelace gets caught just right in the drivetrain, you'll pedal your forehead right into the asphalt.

HOW TO SKID

"There are all kinds of stuff you can do [to stop]. Its all about leaning over the handlebars. That's a good tip too if you want to skid, the more weight you can get over the front of the bike the better. If you can get all the weight off the back wheel, then its really easy to lock it up." - Squid



"Its all about leaning over the handlebars."

PUSH DOWN AND FORWARD

TRICKS

TRACKSTAND

DIFFICULTY: THE ARMPT FART

When you're first starting out take both feet out of the clips. This will keep you from being seen lying on the street under your bike. Bring your pulling foot to 2 or 3 o'clock. Turn your handlebars towards your front foot about 45 degrees. Stand up on your pedals and alternately push backward and forward with both feet to balance yourself. The feeling is very similar to being on a balance board (or a plank with a rolling pin).

NO-HANDED TRACKSTAND

DIFFICULTY: BELCHING THE ALPHABET

Turn your bars close to sideways, let go, lean back and pinch the seat between your thighs. Then learn to do it pinching with just your cheeks.

THE QUICKSILVER HOP

DIFFICULTY: THE WORM

Slow down with your feet out of your toe clips, and your hands on the tops of your handlebars. When your pulling foot is at 1-2 o'clock, in one big coordinated simultaneous move, take off the other foot (aka chocolate foot), and push out and over with your pulling foot, let go and push the handlebars away from you. Land behind your bike walking and catch it by the seat to stop it from rolling away.

BACKWARDS CIRCLE

DIFFICULTY: TRAINING YOUR DOG TO USE

THE TOILET

Get good at trackstanding with your chocolate foot forward. Get good at moving back and forth a few feet while trackstanding both ways. Start in your most comfortable trackstanding position, with your bars halfway between straight and 45. Push, pull, and ride it out. Breaking it down into sections, and working the sections of the circle helps too get your body used to the motions. Wax on. Wax off.



TIPS FROM ALFRED BOBE JR. FOR NEW RIDERS

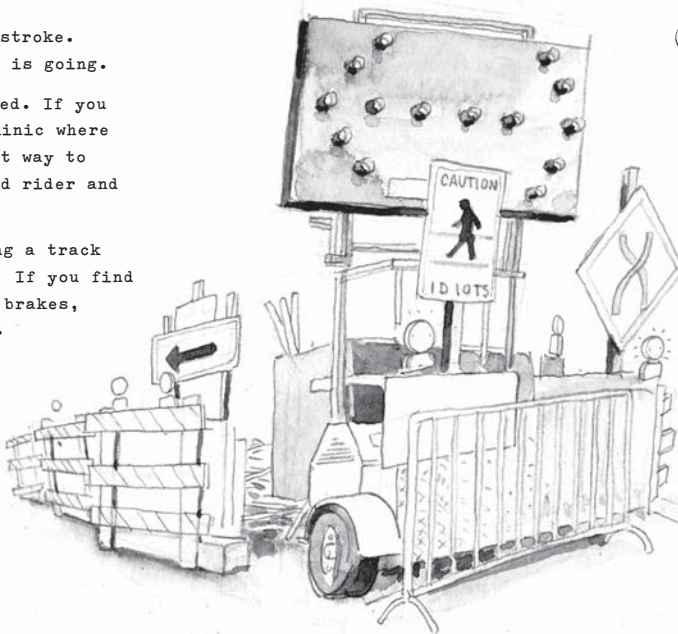
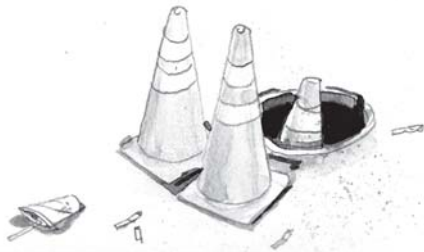
Bobe is a seasoned bike messenger
and CO-captain of TEAM PUMA



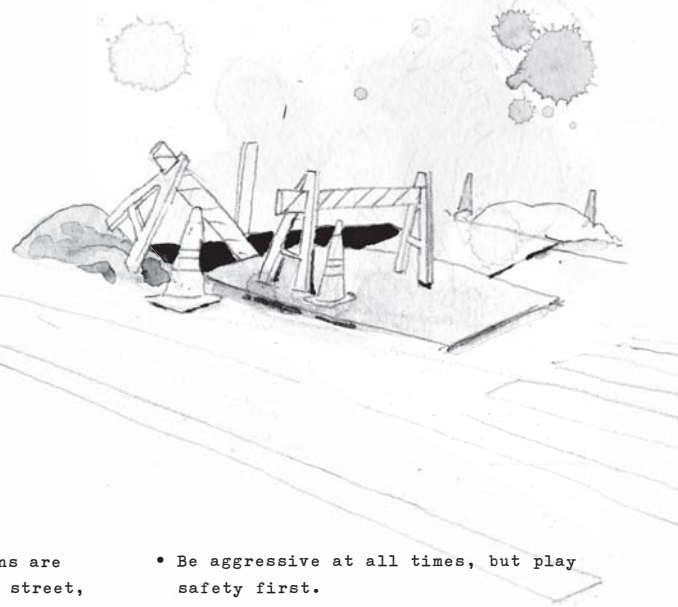
Alfred

- Remember track bikes weren't built or intended for the city. They were meant for the track as a speed bike. We (the messengers) transformed this idea into an urban assault cycling bike in the streets.
- Riding track bikes has become cool and different, but you should pick it up because you have respect for cycling and the cycling culture. Track bikes have been around for more than 100 years and it has a deep cultural history. It's still very difficult and you need to respect it.
- When you first start to ride track bikes, find a safe, open street without traffic. You need to get an idea of how the bike feels physically.
- Wear a helmet and full-fingered gloves. Gloves are important if you take a spill. They can help you slide out of any potential damage you may get into.
- Always think ahead when you're riding. Almost anything can happen with a track bike and physically, it's important to be aware of your surroundings.

- Concentrate on every pedal stroke. Always know where your bike is going.
- Ride with someone experienced. If you don't know anyone, find a clinic where they can teach you. The best way to learn is from an experienced rider and practice.
- Many people who start riding a track bike have trouble stopping. If you find yourself in a bind without brakes, don't try to stop your bike. Instead, redirect it out of trouble – take a quick left or quick right. Or turn the bike sideways for a “hockey” type stop. A hockey type stop is the safest way to stop.



Concentrate on every pedal stroke. Always know where your bike is going.



- Always look out for what pedestrians are doing. Be alert – if they cross the street, you know it's safe to cross. Take notice of pedestrian streetlights as well, they can be good cues for you to ride.
- When crossing an intersection, if traffic is coming from your right, be on the left. And vice versa.
- Be aggressive at all times, but play safety first.
- Riding a track bike is not about being cool, it's about staying alive.

NO BLING

by Squid

“If it’s a fashion accessory, it could be a dangerous fashion accessory.”



“I see a lot of these kids who have, like—it looks like they’re riding a three-thousand dollar bike, and it’s, completely cherry. I think the kids with the bling-bling bikes are asking for it. I’d say don’t have the shiniest bike out there. If you’re riding around the city, you want it to be a little rough-looking, so that people will leave you alone.”

“I guess the best way to do it is go around to the bike shops. EBay is a good place to get stuff, so is Craigslist.”

“A lot of kids focus on getting a really cherry bike, and it’s like fuck that shit. It’s not about how much you spend on it, its

about how fast can you move it.”

“It’s always evolving too. The 21 and 22 year olds are now doing weird and crazy tricks that I would never try to do; Skids with no hands, skidding with their front foot over the handlebars, circus type shit.”

“Another really cool thing about a track bike is if you got it set up right, it’s completely silent. If your chain is not too tight and all your shit’s right, you won’t make a sound. So 9 times out of 10, you can go right past people and they’ll never know you were there.”

“I see a lot of these kids who have, like—it looks like they’re riding a three-thousand dollar bike, completely cherry. I think the kids with the bling-bling bikes are asking for it.”

“I think it’s going to keep growing. People are sick of the auto bullshit. The younger generation is more interested in skateboards and bikes than ever. There’s more bike shops in New York now than ever.”

“I think it’s just going to get bigger and bigger. Back in the 1800’s it was huge. The velodrome racing at Madison Square Garden was the hottest thing going. I can see it happening again. Me and some friends are working a figure-eight velodrome.”

“It seems like the cool thing about a fixed-gear is that if you get on a track it’s easy to watch. That’s one thing that

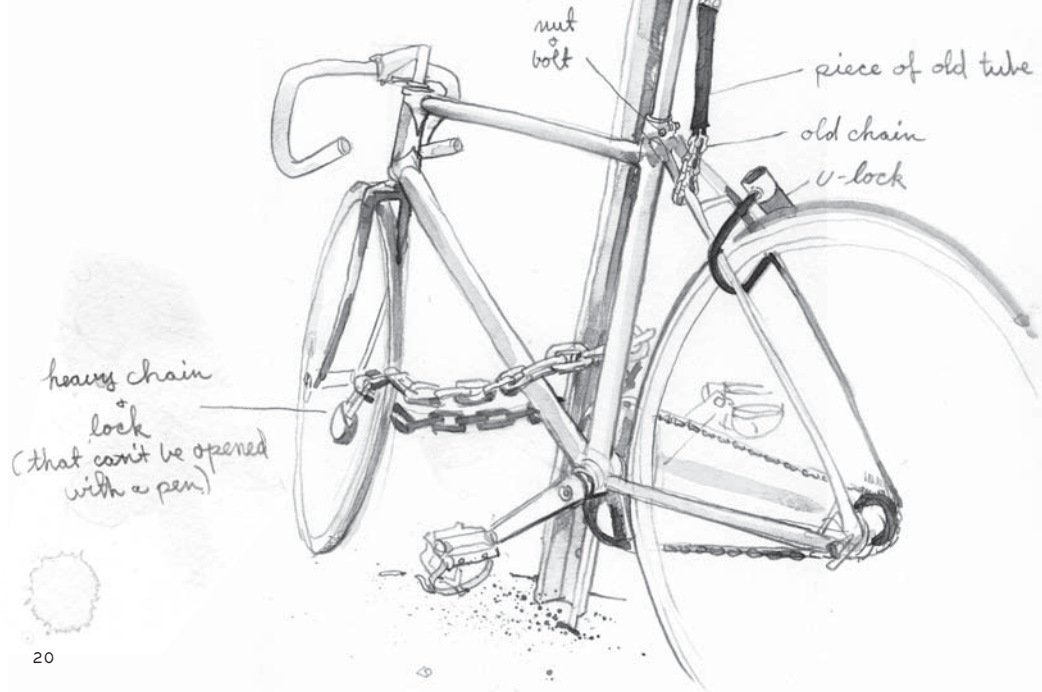
might make it more popular, it’s like a spectator sport. On the street it’s like an individual thing, and you enjoy it with a few people around you who can keep up with you. But if you put it on a velodrome you can drink beer and eat potato chips. In Japan they’ve got Keirin Racing, which is a huge billion-dollar thing and people bet on it.”

“Riding on the street is cool and everything but if you want the real deal, the velodrome is where it’s at, cuz there’s no stopping out there. It’s all go. After two or three laps you can really tell what kind of shape you’re in. It’s an ass kicker!”

LOCKING YOUR BIKE

by Chris McNally

THE RIGHT WAY TO LOCK IT UP



PLACES NOT TO LOCK YOUR BIKE



more things that can break



crack heads & speed freaks



to trees



in bad places

FINISHED

IT SHOULD LOOK
SOMETHING LIKE THIS



THE FIXED-GEAR 101 CONTEST

NOW THAT YOU KNOW THE BASICS OF FIXED-GEAR BIKES, ENTER THE "FIXED-GEAR 101 CONTEST" AND WIN A NEW TRACK BIKE FRAME AND FORK FROM OUR FRIENDS AT CANNONDALE.

HERE IS WHAT YOU DO TO ENTER:

- TAKE A PHOTO OF YOUR ORIGINAL BIKE AND THEN LOG ON TO WWW.PUMAVILLE.COM.
- FILL OUT THE ENTRY FORM AND SUBMIT YOUR PHOTO TO THE GALLERY.
- ON NOVEMBER 30TH 2005, MEMBERS OF TEAM PUMA (PUMA'S CYCLE MESSENGER TEAM) AND CANNONDALE WILL JUDGE ALL THE ENTRIES AND PICK THE BEST SUBMISSION AS THE GRAND PRIZE WINNER.
- THE WINNER OF THE CONTEST WILL RECEIVE A SHINY NEW PROFESSIONAL TRACK BIKE FRAME AND FORK (VALUED AT \$1000), COURTESY OF CANNONDALE.
- ONLY ONE ENTRY PER PERSON.
- CONTEST BEGINS ON OCTOBER 1ST, 2005 AND ENDS ON NOVEMBER 29TH, 2005.
- FOR MORE INFO AND OFFICIAL CONTEST RULES, GO TO WWW.PUMAVILLE.COM.

