Buying a Used Bike
The Bike House

1. Decide what kind of bike you want:
Bikes come in many flavors, decide what kind of bike you want before you start looking.

Road Bike: A road bike is the most efficient type of bike. A road bike often has gears (though single speeds and fixed gears are currently also in style), drop handlebars (which look like rams horns) and a straight top tube. You ride a road bike in an 'aggressive' position, with your back almost parallel to the road which can be uncomfortable for some people, however this is more aerodynamic, so if speed is your goal, this is for you!

Mixte/ step-through frame: these are very quick to mount, as you don't have to step over the top tube and are great for people with restricted agility. They can be a little heavier, but can be safer as they are easier to step off.

Single speed/Fixed Gear: Means you only have one gear, which can make it hard to get up hill, get started from a stop, or to get to higher speed when going down hill. However, you don't need either a front or rear derailleur, which can save on maintenance costs. Unlike Single Speeds, Fixed Gear bicycles cannot coast which means you are always pedaling. You should avoid purchasing a fixed gear bicycle without riding one first.

Mountain Bike: Designed for off-road cycling, these have much larger tires (which increase rolling resistance on the road, decreasing your efficiency). Mountain bikes often have a less aggressive and more upright riding position, and are very comfortable on bumpy roads. Suspension can add some comfort, but at the price of added weight.

City bike / Hybrid: These are designed for practical transportation over speed or weight issues. These bikes generally feature an upright riding position and tires skinnier than a mountain bike.

Materials
Bikes are made of many different materials, each of which have pros and cons.
Steel: What most older bikes (60-90's) are made of. Steel can be a little heavier, however is more flexible and gives a more comfortable ride.
Aluminium: What most newer bikes (90's-) are made of. They often have larger tubes and are sometimes lighter than their steel counterparts.

Carbon: What high-end road bikes are made of. Not recommended for a first-time-buy, or a get-around-town bike.

2. Price range / How much time you want to spend fixing it.
When buying a used bike you often have to make a trade off on how much time you want to spend fixing the bike and how much money you want to spend. A good used bike should set you back around $120-300, but this varies with the time of year, the type of bike and the condition. Set your price range before you start looking for a bike, and it will be easier to say no to a bike which seems too expensive.

3. Start Looking!
Most used-bikes in D.C. are sold on Craigslist. Use your discretion and common sense when looking at online postings. There are a lot of stolen bikes which are sold online, and a lot of people who are trying to make a quick buck on crappy bikes. However, there are also a lot of legitimate postings!
Some things you want to look for:
• Bikes with the brand / model still visible. Not all brands are created equal. Brands made for department stores often weigh more, have cheaper parts, and are less serviceable than ones sold at bicycle stores. Use google or bikepedia.com to try and determine the original value of the bike.
• A description of the size, type, condition and material of the bike. Check out a size chart online to determine which bikes are correct for you. Road bikes and Mountain bikes use different measurements.

4. Go see the bike!
Once you have identified a bike which fits your criteria, go see it! Remember, by going to see the bike never commits you to actually buying it, and there are some basic things that you want to check before you lay down your cash:

0. Size / Seatpost.
Make sure the bike fits you. Can you stand-over the bike comfortably with only a little room to spare? Does the seat height adjust properly to meet your needs? Ride the bike around and gauge how it feels. A little bit of discomfort can quickly become a lot of discomfort if you are riding a long distance.

1. Frame (Rust + dents etc) + Fork (straight)
The frame is the hardest part to fix. Check for any damage from crashes: dings, cracks or bent parts (which don't look like they should be bent). A good method of doing this is running your hands along the entire frame. On a steel frame, small dents are OK, while on aluminium frames, dents can lead to fracture. On a steel frame, check for rust. Some surface rust is OK, but excessive rust can mean that the bike has not been treated too well in the past, which can lead to a lot more maintenance for you. Look at the fork (which holds the front wheel), and make sure that the two sections of it are parallel.

Buying a frame with problems is not a good idea.

2. Bottom Bracket (the part which connects the cranks together).
Grab both cranks (the part the pedals are attached to) and try and move them from side to side. There should be no play. If there is, the bottom bracket needs adjustment.

3. Wheels (true) + tires
Put the bike upside down and spin the wheels. When looking at them from behind, the wheels should be round and not wobbly. Compare the rim of the wheel to a fixed point on the bike (e.g. the brake pads) and see whether there are points in the rim which are closer or further away. If there are, it means the wheel is out of 'true' and can effect the efficacy of the brakes. Slight wobbles can be fixed but a larger one may mean that the wheel is destroyed.

Check each of the spokes on the wheels by squeezing them. If any of the spokes are especially loose, it may mean that the bike has had some impact. If the spokes cannot be tightened, then you need to replace the wheel.

Check the wear on the tires. If there are frayed parts, cracking in the rubber, or if the thread is extremely worn, you will need a new set.

4. Brakes
Check that the brakes are able to stop the bike! Sometimes they just need minor adjustments, but sometimes brakes can be rusted in place. Check that the brake cables and housing (the plastic sheath around the cables) are not rusty or frayed. If they are, they will need to be changed.

5. Gears / drivetrain.
Check that the cables that go to the gear shifters aren't rusty. Check for rust on the chain. When pedalling, make sure that the chain doesn't 'skip' at any point, if it does your chain might have a bad link. A chain that sags too much is worn, and will need to be replaced. If the bike you are looking at has gears, check that both the front and back shift smoothly and into all of the gears.

6. Take the bike for a test ride.
You will often find more problems by riding a bike than simply inspecting it. If at anytime you don't feel safe, stop riding. Make sure you take note of any problems, as these will be good bargaining points with the vendor.

5. Come see us!
If you have just bought a used bike you should get it checked out by a professional mechanic, or come to The Bike House, when we are open and we can help you do a safety check. Feel free to come talk to any of our volunteer mechanics before you buy a bike and ask them about any of the checks mentioned above.