



**Observatoire Europe-Afrique 2030**

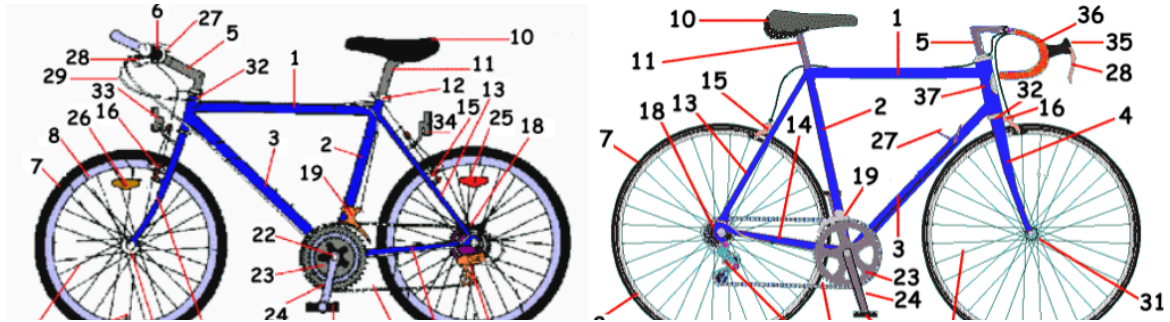
**Data Sheet « Value Chain »**

**Data Sheet n°3**

**Bicycle (entry-level)**

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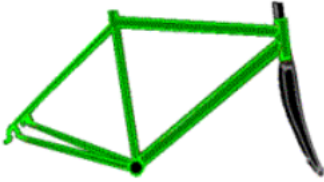



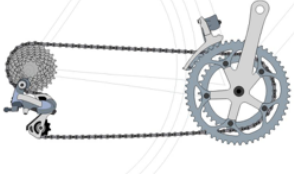
# 1. Components of a bicycle










- 1 - Horizontal tube
- 2 - Seat tube
- 3 - Diagonal tube
- 4 - Fork
- 5 - Stem
- 6 - Handlebar
- 7 - Tire
- 8 - Rim
- 9 - Spoke
- 10 - Saddle
- 11 - Seatpost
- 12 - Seatpost collar
- 13 - Stay
- 14 - Chainstay
- 15 - Rear brake
- 16 - Front brake
- 17 - Chain
- 18 - Freewheel
- 19 - Front derailleur
- 20 - Rear derailleur
- 21 - Pedal + orange reflectors
- 22 - Bottom bracket axle
- 23 - Chainring
- 24 - Crank
- 25 - Orange rear side reflector
- 26 - Orange front side reflector
- 27 - Gear shifters
- 28 - Brake lever
- 29 - Cable sheath
- 30 - Valve

- 31 - Hub
- 32 - Headset
- 33 - Headlight + front white reflector
- 34 - Red headlight + red rear reflector
- 35 - Cocottes
- 36 - Handlebars or handlebars
- 37 - Head tube

The parts listed above can be grouped into a dozen different functional modules.

Modules	Éléments constitutifs	
Frame	Composed of 11 tubes	
Direction	Steering Fork Stem Handlebars	
Wheels	Wheels Rims Rim Spokes	
Tires and tubes		
Transmission	Chain drive consists of a crankset and a cassette (or freewheel). There can be a maximum of three chainrings on the crankset.  Cardan drive consists of gears and a drive shaft.	

Crankset and pedals		
Freewheel (cassette)		
Derailleur	<p>This element is used to change gears. There is one at the front and one at the rear.</p>	
Chain		
Brakes	<p>"Side-pull" brakes found on road bikes. CANTILEVER" brakes on first-generation mountain bikes. V-brake" brakes on mountain bikes. Disc brakes, with two models: the mechanical disc brake connected to the shifter by a cable. Hydraulic brakes operate on the principle of pressure from the lever.</p>	
Seat Saddle	Saddle Tube	

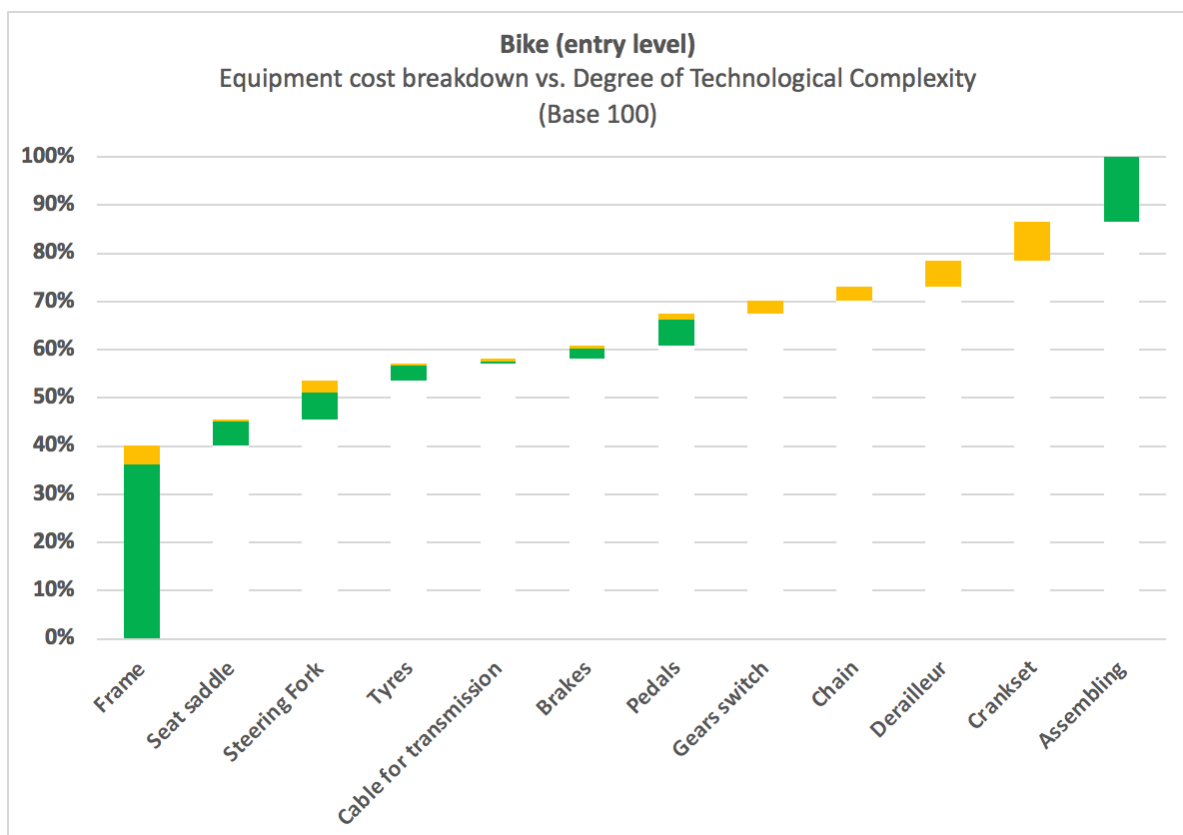
Small tools	Tools Patches + glue Screws port can Pump Multifunctional tools Allen wrench, spoke wrench, chain drift	
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## 2. Geographical origin of components

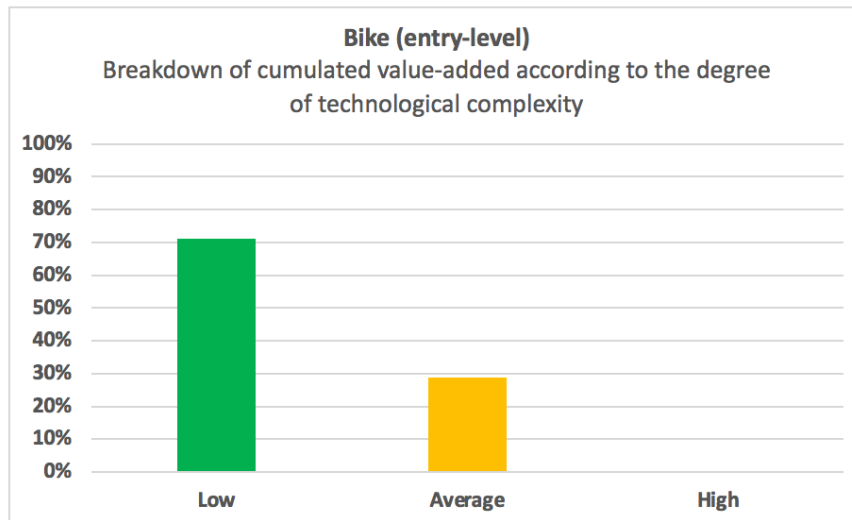
Bikes are often assembled in Europe, but most parts are still produced in Asia. The majority of manufacturers are dependent on this part of the world. The components most concerned are frames, brakes, tires and derailleurs. For derailleurs, the world market is controlled by two companies (Shimano and Sram). The Asian continent accounts for more than 90% of component origins.

## 3. Value chain

Three components - frame, saddle and fork - account for between 50% and 55% of the added value of the finished product.



*Source : Observatoire Europe-Afrique 2030. These data have been estimated on the basis of bibliographical information. They represent orders of magnitude.*



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## 4. Sources of Information

<https://www.ffct-codep18.org/2017/03/08/tout-savoir-sur-le-velo/>

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