

TREK BICYCLE CORPORATION

Trek Bicycle Corporation began in 1976 when a dozen cyclists in a small shop in Waterloo, Wisconsin began producing high quality bicycle frames. The company was founded on the belief that superior bicycles could be manufactured in the United States. In the 15 years since then, many new technologies have become available and Trek is always quick to fully develop and implement them. This innovative approach has made us the leader in premium quality bicycle building. As the word of Trek's quality spreads, so does the satisfied group of loyal Trek riders. Our bicycles can now be found all over the world. But despite many changes over the years, we continue to remain true to our founding belief: superior bicycles can be built in the United States. The same care and attention to detail that went into our very first bicycle still goes into every bicycle we build.

At Trek, each passing year brings our bicycles closer to the elusive goal of perfection. With designers and engineers that are driven toward discovering and implementing new technologies, we are continually improving existing bicycles and developing the basis of new ones. Never satisfied with the merely acceptable, we have developed unique and superior methods of frame construction. These advanced techniques allow us to build premium frames using chrome-moly steel, bonded aluminum, and carbon fiber composite. These frames are meticulously constructed and precisely aligned for maximum strength and stability. Extensive research and engineering has allowed us to build these frames with absolute minimum weight. Just as each Trek bicycle is evolving, the entire Trek line is evolving also. Constantly adapting to meet changing need, we are introducing several new bicycles in 1991 designed to enhance our already extensive line. This continual refining and improvement of our bicycle line, and our bicycles, means that there is a high quality Trek to meet virtually every cyclist's needs.

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CONSTRUCTION METHODS

Every rider has individual needs and expectations in a bicycle. Our Function Specific Design begins by taking into account a rider's size, terrain preference, riding style, and cycling aspirations before deciding on frame geometry, componentry and ergonomics. This guarantees a perfect match between bicycle and cyclist. When a customer's needs and their bicycle match, they are much better prepared for an exhilarating, comfortable, and trouble free ride, whether that ride is to the grocery store or the finish line.

Bonding Lugs

Trek utilizes three construction methods in producing bicycles, Bonding, Brazing and TIG welding. We make sure our construction methods create joints that are of highest integrity for the material used. All joints are engineered to be stronger than the tubes they join, so a joint does not fail before the tube would.

Trek utilizes a lug and bonding method to construct our aluminum and composite bicycles. The heart of these bicycles is our unique lugged construction system. Developed using the latest CAD techniques, the lugged system guarantees accurate frame alignment. The lugs have a tapered, splined plug which insures a concentric bonding of the tube and an optimum adhesive gap for every joint. The lugs and dropouts are either cast or forged to produce a fitting that is light, precise and durable.

Adhesive
We use an aerospace epoxy adhesive which has proven itself in numerous aircraft and other industrial applications. It was chosen over other adhesives for its superior tensile shear (the force it takes to pull the tube from the lug) of approximately 5,500 psi (for example, it would take 14 tons of weight hung from the head lug to pull the tubes away). The same adhesive is used for aluminum/composite and aluminum/aluminum bonds.

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Prep Work

Trek pays close attention to every detail, ensuring an optimum bond. The surfaces of the lugs are sand blasted, then washed. The interior of the tube ends are also abraded and then cleansed. These two processes create the best possible surface for the adhesive to cure.

Bonding vs. Welding of Aluminum

Bonding is a better method of construction of aluminum than welding for a number of reasons. It allows the use of high tech, non-weldable alloys such as 7000 series aluminum. These alloys are typically stronger and lighter than many other materials. In addition, bonded frames can be lighter using the same material than a welded frame because thinner walled tubing can be used. Finally, bonded frames do not need additional heat treating like welded frames, therefore the integrity of the metal remains unchanged in a bonded frame because the tube is not heated to the level required in welding.

Brazing vs. Welding of Chrome-moly

All U.S. built Trek steel bicycles are constructed using lugs and low temperature brazing. The advantage of this method over welding is that with lugged and brazed construction you do not have to heat the metal to nearly the degree necessary to weld, which requires melting the base metals. Thinner walled tubing can be used with brazing because of these lower temperatures. When used with our lugs, this results in a livelier frame.

Lugs

Trek's steel seat lugs are an investment cast design that features an internal seat collar and seat stay sockets. This design interfaces well with manufacturing and allows for more efficient production. For the first time our steel frames also utilize bulge formed lugs. Bulge forming produces a lug that is approximately 1/2 the weight of an investment cast lug.

Overall, our brazing process allows us to produce an extremely strong, yet lightweight frame that keeps the original properties of the materials intact.

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MATERIALS ANALYSIS What Materials Make Good Bicycle Frame Tubing?

by Bob Read, Trek Technology Manager

Two materials to used on Trek's Kestrel, Mootz, Muck and Super bicycles. TIG welding provides a sound, economical joint. It is an efficient method, but the high temperature needed to fuse the two materials together require the use of thicker walled tubing and lessens the inherent integrity of the base tubing.

A material's physical and mechanical properties determine whether or not it will make good bicycle tubing. In addition to the more mundane properties such as corrosion resistance, fabricating ease, and cost, the best materials for bicycle frame tubing have an optimum blend of two important properties: **specific ultimate strength**, and **specific modulus**.

Specific Ultimate Strength

In the terms "specific ultimate strength" and "specific modulus" the word specific means "divide by density". Density is defined as mass per unit of volume. Example: If A and B are materials with equal strength, but A has a density half that of B, A will have a specific strength twice that of B.

The two most common measures of strength are "ultimate strength" and "yield strength". Ultimate strength is defined as the force per unit cross-sectional area which causes a material to separate completely. Yield strength is defined as the force per unit cross-sectional area which causes the material to deform in such a way that when the force is removed the material stays deformed.

Why should you be concerned with two measures of strength for bicycle frame materials? You may think "isn't a bicycle frame just as unusable whether it is bent or broken?"

Two measures are necessary because some materials will barely stretch before they break. Their yield strength and ultimate strengths are almost the same value. Examples are composites such as ceramic and graphite/epoxy, and very high strength metals such as tool steel. (Figure 1 reflects this fact in the blank spaces for yield strength and elongation under the graphite/epoxy composite.)

Because of this, design of graphite/epoxy composite tubing requires using enough material so the yield strength or ultimate strength will not be exceeded during anticipated conditions of use.

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On the other hand, most metals, including most aluminum, titanium and steel alloys stretch considerably before they break.

This leaves us with a choice of design approaches. One, use a composite material and make it strong enough to exceed intended use. (So as not to break except under truly spectacular conditions,i.e. spectacular crashes.) This choice is not reasonable for metals because it would result in an uncompetitively heavy tube.

So our second design approach is to use a metal and design the structure to yield in almost-but-not-quite-spectacular conditions and to continue to fold perhaps to the point of breaking under spectacular conditions (spectacular crashes).

Specific Modulus

The second important property in choosing a material for bicycle frame tubing relates to specific modulus. Modulus of elasticity means stiffness. Every material has its own natural spring constant. This does not necessarily mean that frames made with some materials are inherently stiff or soft. Adjusting the amount of material used is the way to get the right balance of frame stiffness with a given tubing material.

However, there are two limiting conditions on the use of material to adjust frame stiffness. One, if the specific modulus is quite low, even if the specific strength is high, it may require too much material therefore too much weight to achieve a desired stiffness. The other is if the specific modulus is high but the specific strength is quite low it may require too much material, weight and stiffness, to achieve the needed strength.

We see from these two measures that a material is a good choice if it has a good balance between high specific strength and high specific modulus. The result when choosing a frame tubing material which is unbalanced in either direction is a frame which sacrifices either performance or weight.

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Properties of Bicycle Frame Tubing

Figure 1

Tubing Material	b Density (LB/IN ³)	c Ultimate Tensile Strength (KSI)	d Specific Strength (c/d)	e Ultimate Yield Strength (KSI)	f Specific Yield Strength (e/f)	g Modulus of Elasticity (MSI)	h Specific Modulus (g/b) (g/lb)	i Elongation (%)	j Use Model
Graphite/Epoxy Composite	.0564	116	2057	-	-	7.88	140	-	Trek 2100, 2300, 2500, 8700, 8900
Easton 7000 E9 (7001 19511)	.100	92	920	84	840	10.3	103	9	Trek 8000, 8500
Easton 6061 E9(6061 T9511)	.098	64	653	58	592	10.0	102	9	Trek 1200, 1400, 1420, 7000
Alcoa 6061-T6 (6061 T651)	.098	45	459	40	408	10.0	102	17	Trek 1000, 1100, 6000
"Heat Treated" Chrome-moly Steel (4130Oil Quench & Temper)	.283	150	530	122	431	30.0	106	20	Trek 990
Chrome-moly Steel	.283	135	477	115	406	30.0	106	25	Trek 800, 820, 830, 850, 930, 950, 970
Sandvik Titanium (Ti-3.3.5 CWSR)	.162	132	815	115	710	15.0	93	19	Merlin, Litespeed
Specialized M2	.1032	52	504	46	446	12.6	122	5.4	Specialized M2 models
Duralcan 6061 15%Al203-T6)									
Schwinn Aluminum (5386 H32)	.096	42	438	30	313	10.3	107	12	Schwinn Aluminum

How Do the Various Tubing Materials Compare?

Now that we know the two major factors in determining what materials will make good choices for frame tubing, lets compare a number of popular tubing materials.

Graphite/Epoxy Composite

There is one material which truly stands out from the crowd for bicycle frames. That material is graphite/epoxy composite. It tops the lists for both highest specific strength and highest specific modulus. For this reason, properly designed graphite/epoxy composite tubed frames offer maximum performance-to-weight ratio by a wide margin. There may be lighter frames, but not with the same performance. There may be frames which perform as well, but not at the same weight. This is guaranteed by the properties of the material, provided it is used properly.

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What, if anything will come along to surpass graphite/epoxy? It is a true statement that the leader in materials technology is the military/aerospace industry and that the bicycle industry materials technology lags behind. However, one important fact is likely to insure the importance of graphite/epoxy in bicycle technology for the future. The military/aerospace applications for materials pose an additional challenge, the ability to operate at extremely high temperatures.

Many materials in the news today, ceramics, metal matrix composites, super light aluminum alloys, must accept lower specific stiffness and specific strength than graphite epoxy, in order to operate at high temperatures.

Many materials in the news today, ceramics, metal matrix composites, super light aluminum alloys, must accept lower specific stiffness and specific strength than graphite epoxy, in order to operate at high temperatures. The path of military/aerospace materials technology and the path of bicycle materials technology are diverging due to different requirements.

Among metals, there are large differences in specific strengths and not as much difference in specific moduli.

The 7001 T9511 aluminum provides the best balance of properties among the metals. It has the highest specific strength and very good specific modulus. In addition, because aluminum is less dense than titanium or steel, it has the greatest flexibility in terms of tube design. This helps achieve the goal of increasing lateral and torsional stiffness while maintaining a comfortably low value for tensile and compressive stiffness.

TREK METALS

7001 T9511 Aluminum

6061 T9511 Aluminum

6061 T9511 aluminum provides an incremental improvement in specific strength and an incremental reduction in specific stiffness compared to chrome-moly steel.

COMPARISON METALS

Titanium alloy 3-2-5 has a very high specific strength (lower only than graphite/epoxy composite and 7000 series aluminum). However its specific modulus is the lowest of all the metals used in bicycle frames. This imbalance of properties means that an inordinate amount of material (a heavier frame) needs to be used to achieve a frame with the same performance as frames of 7000 aluminum or chrome-moly steel.

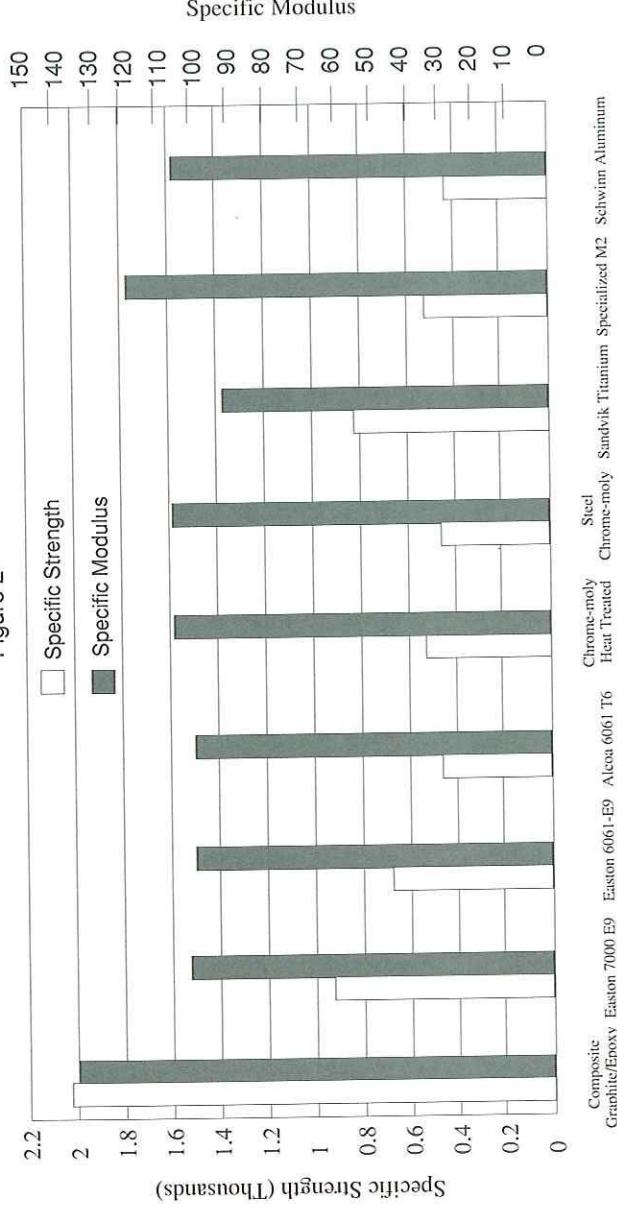
The Duralcan material (a metal matrix composite) used in the *Specialized M2* frames is the mirror image of the titanium picture—a material with a very high specific stiffness, but a low-to-moderate specific strength. This is not to say that the Duralcan material is a bad material. It would be great for an application in which a higher stiffness, moderate yield strength material was required. An example is tank armor, where one of the design parameters is that the material be used in a thick section to resist ballistic impact. In this case the added stiffness is a plus, and the moderate yield strength is not a penalty, because it is a given that a thick section be used.

The final metal we compared is a non-heat treated aluminum. It has the distinction of having the lowest specific strength of all the above materials. An example of this type of material is the 5386 H32 alloy used by Schwinn.

A conclusion can be made from this information that materials make good bicycle tubing if they have a good balance between high specific strength and high specific modulus. Clearly the best materials are graphite/epoxy composites and 7000 series aluminum.

Specific Modulus & Specific Ultimate Strength

Figure 2



METHODS

Single Track Mountain Bikes

The biggest change for 1991 is the introduction of Optimal Dimension (O.D.) tube design to our SingleTrack bikes. Computer aided research and modeling helped us arrive at the optimal proportions for each element of the frame. O.D. utilizes large diameter, thin wall tubes to provide better strength and distribution of pressure without an increase in weight. Use of O.D. head tubes strengthens the entire bike by providing a stronger juncture point for the frame and also allows use of oversize headsets with more bearings. This distributes stress more efficiently and reduces wear on the headset. Use of a large diameter steer tube provides additional strength through better torsional and bending rigidity. Our O.D. stems have a one inch diameter steerer, and 1 1/8 inch headset, which increases overall steering system stiffness and allows the use of non-ferrous materials, further reducing weight. The added strength of this system offers greater control over the new stronger oversize forks.

Our SingleTracks have also gone through a size change operation! Our engineers studied data from NASA on human sizes and proportions and adjusted the sizing of the SingleTracks to best fit the widest range of the human race.

Feature	Benefit
O.D. Heat Tube	Stronger, allows use of oversize headsets and steer tubes
O.D. Main Tubes	Creates a stronger and stiffer yet lighter frame
O.D. Headsets	Distributes stress more evenly, increasing the life of the headsets.
O.D. Steer Tubes	Stronger front end and more responsive steering
O.D. Stems	Increases stiffness and allows use of non-ferrous, lighter materials
New Sizing	More people can get the most out of riding

METHODS

Single Track Frame Analysis

Frame	Weight (lbs.)	BB Torsion Stiffness (ft. lbs./angle)	Lateral Bending Rigidity (lbs./inch)
90 970, 18"	5.39	89.9	150.6
91 970, 18"	5.04	112.5	167.3

1991 Single Track Frame Tube Diameter

	Head tube	Top tube	Down tube	Seat tube	Seat stay	Chain stay
990	1.43"	1.25"	1.38"	1.25"	.75"-.50"	.88"-.56"
970	1.43"	1.25"	1.38"	1.25"	.75"-.50"	.88"-.56"
950	1.43"	1.25"	1.25"	1.125"	.63"-.44"	.88"-.50"
930	1.43"	1.25"	1.25"	1.125"	.63"-.44"	.88"-.50"

Composite Mountain

The 1991 8900 and 8700 offer superior strength and lightness because of Trek's exclusive carbon fiber tubing. All aspects of the tube, from wall thickness and diameter to materials, are specified by our engineers. Our U.S. made composite tubes have an inner layer of Spectra™ which gives exceptional strength to the tube, and a fiberglass sleeve to protect against galvanic corrosion between the carbon and aluminum.

Feature	Benefit
Carbon fiber tubing	The best blend of lightness and strength
Spectra lining	Adds exceptional strength to the tube
Fiberglass sleeve at tube end	Prevents galvanic corrosion between carbon and aluminum parts

bikes. Squeeze casting increases the ductility of a lug and therefore makes it more durable. Our aluminum ATB's also benefit from O.D. design. They now have significantly larger head tubes, which in combination with oversize headsets, are stronger, lighter and distribute stress better to increase overall durability.

Feature	Benefit
Squeeze cast lugs	Increased strength
O.D. Head Tube	Stronger, allows use of oversize headsets and steer tubes
O.D. Headsets	Distributes stress more evenly, increases the life of the headsets.
O.D. Steer Tubes	Stronger front end and more responsive steering
O.D. Stems	Increases stiffness and allows use of non-ferrous, lighter materials

Antelope Mountain
The 830 and 850 get a competitive shot in the arm with the use of O.D. head tubes, top tubes, headsets, stems and steer tubes. This change substantially increases the frontal strength and durability of these two models and makes them an even better value for your customers.

Feature	Benefit
O.D. Head Tube	Stronger, allows use of oversize headsets and steer tubes
O.D. Top Tubes	Creates a stronger and stiffer yet lighter frame
O.D. Headsets	Distributes stress more evenly, increasing the life of the headsets.
O.D. Steer Tubes	Stronger front end and more responsive steering
O.D. Stems	Increases stiffness and allows use of non-ferrous, lighter materials

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Multi-Track
Multi-Tracks offer the best of both worlds – road and trail, and for 1991, there are more choices to match your customers needs. We have added a new model, the 7900. This bike offers a high level performance aluminum frame that combines the toughness of our aluminum mountain bikes with the fast wheels and geometry of our Multi-Tracks for a bike that literally can go anywhere, and do it well.

Feature	Benefit
New aluminum model	Lighter frame that provides the same toughness as our aluminum mountain bikes

Composite Road
Trek's composite road line adds a new member to the family with the addition of the 2100. Now your customers can get a race-ready carbon bicycle for the price of many steel or aluminum bikes!

The other big news for Trek's '91 composite line is supply. To make sure that we have as many bikes available as you can sell, we have gone to dualsourcing for our carbon tubing. In addition to Quality Composite Inc., we have added tubing giant True Temper as our major supplier of composite road tubing.

Feature	Benefit
Carbon Fiber tubing	The best blend of lightness and stiffness available
New model 2100	A great value for a carbon racing bike
Dual sourcing of tubing	Good supply of these incredibly popular bicycles

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Aluminum Road

Trek uses Aluminum tempered to an E9 level for models 2000, 1420, 1400, and 1200. The E9 process produces a stronger tubing through the use of a combination of cold work, heat treating and aging. After this heat treatment, Easton E9 tubes are drawn to exact specifications and have up to 30% more strength than T6 or T8 tempers.

Trek's exclusive lug and bond process also contributes to the superior quality of our aluminum frames. Bonding the tubes to the lugs eliminates any fatigue that may be caused by high temperature welding, and also allows the use of ultra-high performance tubing like Easton 7000 E9.

Feature	Benefit
E9 temper tubing	Strong frames
Lug and bonding construction	Precise alignment and superior strength, allows use of high performance alloys.

Chrome-moly Road

The model 400 is back in Trek's line for 1991. The modified sport geometry makes it ideal for recreational riding as well as entry level racing. The 520 one of the few all out, no compromise touring bikes still available.

TOP TUBE CABLE ROUTING

Triple Tech top tube cable routing reduces fouling due to mud and debris, simplifies maintenance and increases the durability of the down tube by eliminating the attachment points on this critical tube. This form of routing is used on all of our SingleTrack, Aluminum, and Composite mountain bikes as well as the 7900 Multi-Track and the 850 and 830 Antelope bicycles.

Feature	Benefit
Top tube cable routing	Reduced fouling due to mud and debris, simplifies maintenance, and increases the durability of the down tube.

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FORKS

Many of our mountain bikes feature new and upgraded forks for 1991. The 8900 and 990RS feature the innovative Rock Shox suspension fork. The top of the line rider deserves the best handling available. Rock Shox provide incredible shock dampening and give the rider more control on descents or rough terrain like washboard trails. This also helps decrease rider fatigue.

The Tangie Super Big Fork and Big Fork provide a substantial increase in strength and are also more rigid than conventional forks. You get a more responsive, stiffer ride with no additional weight. The Super Big Fork, Big Fork and Cruise Control forks feature constant diameter bend fork blades. These forks provide a more predictable response and therefore more control, especially under side loading in hard corners. The Multi-Track forks have been redesigned to provide maximum tire clearance, allowing more tire size options in tire.

The 1000 and 1100 now have TIG welded, uni-crown forks. This decreases weight by eliminating a cast steel crown.

The 520 fork has been redesigned to provide more clearance. This allows more choices for tires, as well as better fender clearance.

Feature	Benefit
Rock Shox forks	More comfort and control
Tangie Super Big & Big forks	More responsive, stiffer steering
Constant diameter bend blades	More predictable response, great cornering
New Multi-Track & 520 fork	Better clearance for fenders and wider range of tire sizes
Uni-crown road forks	Lighter weight, more comfortable

1991 MATRIX WHEEL SYSTEMS

Tires

The new Z-Axis™ tire system will revolutionize off-road cycling. Both the front and back tire are individually designed to meet the very different demands placed upon them. The front tire design emphasizes handling in turns and is engineered to provide maximum resistance to side loads. The rear tire is designed to provide maximum climbing traction. This is accomplished through a center row of tread blocks which presents a surface that penetrates and sets to provide great forward thrust. The combination of tread patterns creates a highly efficient tire system that delivers better traction and handling.

Rims

All Matrix rims are designed and built in our Waterloo plant. Matrix rims have achieved the reputation as some of the industries finest rims. Trek extensively utilizes computer aided design on all of our rim models. In doing so , we work to optimize each cross section's polar moment of interia. This allows us to place material exactly where needed to provide the maximum strength to weight ratio, while taking into account the rim's braking, tire mounting and spoke seating requirements. We utilize a pinned construction method verses a bonded or welded method. This creates very strong rims with a more consistant braking surface. All Matrix rims are made of 6061 T6 aluminum, an aircraft quality alloy that has higher tensile strength and yield strength than other commonly used alloys. Matrix rims are hard anodized which creates a longer lasting surface finish and improves the overall strength. We also draw on years of wheel bulding experience to constantly refine and improve our rim designs to produce the best rims possible.

Feature	Benefit
Pinned construction	No need for bonding or welding, therefore the mechanical properties of the material is not altered, and the surface is more consistant allowing better anodizing.
6061 T6 aluminum	Higher tensiles and yields than other commonly used alloys. Aircraft quality alloy.
Hard Anodizing	Longer lasting surface finish, and improves overall strength of the rim by approximately 5%.

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1	SIZE	HOLE DRILL	WEIGHT	OFFSET DRILL	FINISH		Height	Outside Width
					Inside Width	Outside Width		
CII	700c	36, 32, 28	410g	No	Grey hard anodized	17mm	18mm	19.3mm
CII	27"	36	410g	No	Grey hard anodized	17mm	18mm	19.3mm
II	700c	36, 32, 28, 24	375g	No	Grey hard anodized	16.5mm	16.2mm	18.5mm
AN II	700c	36, 32	400g	No	Grey hard anodized	17.3mm	13mm	19.6mm
AN II	27"	36	400g	No	Grey hard anodized	17.3mm	13mm	19.6mm
AN TOUR	700c	48, 40, 36	500g	No	Grey hard anodized	19.5mm	16.3mm	22mm
AN TOUR	27"	36	500g	No	Grey hard anodized	19.5mm	16.3mm	22mm
AERO	26"	36, 32, 28	360g	Yes	Grey hard anodized	17mm	18mm	19.3mm
ANII ATB	26"	36, 32	355g	Yes	Grey hard anodized	17.3mm	13mm	19.6mm
GLETRACK	26"	36, 32	510g	Yes	Grey hard anodized	18.7mm	18.7mm	24mm
GLETRACK	26"	36, 32	460g	Yes	Grey hard anodized, Silver anodized	19.5mm	16.3mm	22mm

Our 8900, 8700, 8500, and 990 performance mountain bikes now feature wheels built with double butted spokes. Use of double butted spokes decreases overall weight of the wheels while increasing the resiliency of the wheel. We also use 15 gauge spokes on our road bikes and carefully match spoke gauge to rim section to optimize the wheel's performance.

Spokes

TREK 8900

Construction/Material: Bonded/Double butted Graphic/Epoxy main tubes with aluminum stays.

Component Group: Features a Sugino XP forged crankset, SunTour XC Pro derailleurs and thumb shifters, Grafton Speed Control brakes, Bullseye hubs, and XC Pro Grease Guard pedals.

Additional Highlights: Matrix wheel system with Titan II ATB rims and Z-Axis tire system, Answer A-Tac aluminum stem and Hyperlite handlebars, Selle Italia Turbo saddle, American Classic seatpost, Onza bold bar ends, Rock Shox fork.

Colors: Natural carbon with neon yellow with black splash front and rear with purple decals.

Double butted graphite/epoxy tubing

Strength, Durability, Shock Absorption

conditions, shock absorption and minimal weight.

Bonded frame

Creates a precisely aligned, very rigid frame that gives the rider efficient energy transfer and quick acceleration.

Matrix wheel system with Z-Axis tires

The most advanced ATB tires and rims available. Different front and rear tread patterns combine to provide the best traction available.

Triple Tech™ top tube cable routing

Reduces mud fouling and allows easier maintenance.

Rock Shox fork

Allows greater control and faster riding especially on descents.

SPECIFICATIONS MODEL 8900

Sizes (in/cm)	15/38	16.5/42	18/45.7	20/51	22/56
Stand-over Height (in/cm)	27.95/71	28.0/71.2	29.1/73.9	30.7/77.9	32.6/82.9
Top Tube Length (in/cm)	20.7/52.5	21.7/55	22.3/56.6	22.6/57.4	23/58.4
Head Angle	70.5°	70.5°	71°	71°	71°
Seat Angle	73.0°	73.0°	73.0°	73.0	73.0
Chainstay Length (in/cm)	16.9/42.9	16.9/42.9	16.9/42.9	16.9/42.9	16.9/42.9
Seatpost Diameter (mm)	27.2	27.2	27.2	27.2	27.2
Seatpost Length (mm)	300	300	300	300	300
Crank Arm Length	170	170	175	175	175
Stem Length (mm)	120	120	135	135	150
Handlebar Width (mm)	530	530	530	530	530
Bottom Bracket Axle (mm)	(42/52/59, 3RT)				
Bottom Bracket Shell (mm)	68				
Seat Tube O.D.	34.9				
Front Spoke Length	268	14/15 Gauge D.B.			
Rear Spoke Length	266/268	14/15 Gauge D.B.			

°GEAR RATIOS

28	23	35	45
28	23	35	45
24	27	41	52
18	36	54	69
14	46	69	89
12	54	81	104

COMPOSITE TREK 8700

Product Feature	Rider Benefit
Double butted graphite/epoxy tubing	Strength for even the most extreme conditions, shock absorption and minimal weight.
Bonded frame	Creates a precisely aligned, very rigid frame that gives the rider efficient energy transfer and quick acceleration.
Tange Super Big Fork	A stronger, stiffer fork with no additional weight
Matrix wheel system with Z-Axis tires	The most advanced ATB tires and rims available today provide superior strength and traction.
Triple Tech™ top tube cable routing	Reduces mud fouling and allows easier

Series:	Off-road Racing
Construction/Material:	Bonded/Double butted graphite/Epoxy main tubes with aluminum stays.
Component Group:	A select assortment featuring a lugino XP forged crankset, SunTour XC Pro derailleurs and thumb shifters, Dia Compe 986 king system, Bullseye hubs, and SR Low Fat Pro and anodized sealed bearing pedals.
Additional Highlights:	Matrix wheel system with titan II ATB rims and Z-Axis tire system, Answer paper Lite bars, Selle Italia Turbo saddle, Matrix hard anodized seat post, Tange Super Big Fork.
Colors:	Natural carbon tubes with conch with black blash front and rear with conch decals.

SPECIFICATIONS MODEL 8700	
Sizes (in/cm)	15/38
Stand-over Height (in/cm)	27.95/71
Top Tube Length (in/cm)	20.75/52.5
Head Angle	70.5°
Seat Angle	73.0°
Chainstay Length (in/cm)	16.9/42.9
Seatpost Diameter (mm)	27.2
Seatpost Length (mm)	300
Crank Arm Length	170
Stem Length (mm)	105
Handlebar Width (mm)	530
Bottom Bracket Axle(mm)	(42/52/39, 3RT)
Bottom Bracket Shell (mm)	68
Seat Tube O.D.	34.9
Front Spoke Length	268
Rear Spoke Length	266/268

GEAR RATIOS	
24	36 46
54	81 104
46	69 89
41	61 78
36	54 69
31	46 59
27	41 52
23	35 45

TREK 8500

(Featuring: 7 speed SIS HyperGlide, SuperGlide crankset Low Profile cantilever brakes with SLR Servo Wave levers, RapidFire shifters.

Additional Features: Matrix wheel system with Z-Axis tire system, Answer TaperLite handlebars, Selle Italia Turbo saddle, Matrix hard anodized seatpost, Tange Super Big Fork.

Colors: Black with blue and red splash with red decals.

E9 double butted aluminum tubing.
Component Group: Shimano Deore XT

E9 double butted aluminum tubing.
Bonded frame

Easton 7000 E9 double butted tubing
Tange Super big fork

Superior strength with minimal weight
Creates a precisely aligned, very rigid frame that gives the rider efficient energy transfer and quick acceleration.

A stronger, stiffer fork with no additional weight

SingleTrack Comp 32 hole rims and Matrix Z-Axis tire system, Answer TaperLite handlebars, Selle Italia Turbo saddle, Matrix hard anodized seatpost, Tange Super Big Fork.

Matrix Wheel system with Z-Axis tires
Triple Tech™ top tube cable routing

The most advanced ATB tires and rims available. Different front and rear tread patterns combine to provide the best traction available.

Black with blue and red splash with red decals.

Reduces mud fouling and allows easier maintenance.

SPECIFICATIONS MODEL 8500	
Sizes (in/cm)	15/38
Stand-over Height (in/cm)	27.95/71
Top Tube Length (in/cm)	20.7/52.5
Head Angle	70.5°
Seat Angle	73.0°
Chainstay Length (in/cm)	16.9/42.9
Seatpost Diameter (mm)	27.2
Seatpost Length (mm)	300
Crank Arm Length	170
Stem Length (mm)	105
Handlebar Width (mm)	530
Bottom Bracket Axle (mm)	(39/52/42, 3RT)
Bottom Bracket Shell	68
Seat Tube O.D.	34.9
Front Spoke Length	267
Rear Spoke Length	266/265
Bonded frame	

GEAR RATIOS	
	24 36 46
	12 52 78 100
	14 45 67 85
	16 39 59 75
	18 35 52 66
	21 30 45 57
	24 26 39 50
	28 22 33 43

TREK 8000

	Product Feature	Rider Benefit
Materials: Off Road Racing Construction/Materials: Bonded/Easton 7000 double butted aluminum tubing.	Easton 7000 E9 double butted tubing Bonded frame	Superior strength with minimal weight
Component Group: Shimano Deore DX & XT featuring: 7 speed SIS HyperGlide, SuperGlide crankset, Deore XT Low Profile SLR cantilever brakes, RapidFire shifters with Servo Wave).	Tange Super Big fork	Creates a precisely aligned, very rigid frame that gives the rider efficient energy transfer and quick acceleration.
Additional Features: Matrix wheel system with SingleTrack Comp 32 hole rims and Matrix Z-Axis tire system, Vetta Gel plus Shock Middle, Matrix hard anodized seatpost, Tange Big Fork.	Matrix wheel system with Z-Axis tires Matrix top tube cable routing	A stronger, stiffer fork with no additional weight Reduces mud fouling and allows easier maintenance.

Colors: White with black splash with blue decals.

SPECIFICATIONS MODEL 8000	
Sizes (in/cm)	15/38
Stand-over Height (in/cm)	27.95/71
Top Tube Length (in/cm)	20.7/52.5
Head Angle	70.5°
Seat Angle	73.0°
Chainstay Length (in/cm)	16.9/42.9
Seatpost Diameter (mm)	27.2
Seatpost Length (mm)	300
Crank Arm Length	170
Stem Length (mm)	105
Handlebar Width (mm)	520
Bottom Bracket Axle(mm)	(42/52/39, 3RT)
Bottom Bracket Shell (mm)	68
Seat Tube O.D. (mm)	34.9
Front Spoke Length	269
Rear Spoke Length	266/268
	14 Gauge
	14 Gauge

GEAR RATIOS	
24	36 46
48	72 92
42	62 80
37	55 70
31	47 60
27	41 52
24	36 46
21	31 40

ALUMINUM

TREK 7000

Construction/Materials: Bonded/Easton 6061
E9 double butted aluminum tubing.

Component Group: Shimano Deore LX & DX
(Featuring: 7 speed SIS HyperGlide, SuperGlide
crankset, Deore DX Low Profile cantilever
brakes with SLR, Deore DX Rapid Fire shifters.

Additional Features: Matrix wheel system
with SingleTrack Comp 32 hole rims and
Matrix Cliffhanger tires, True Temper Chrome-
moly handlebars, Vetta Gel plus Shock saddle,
Matrix hard anodized seatpost, SR Low Fat
pedals, Tange Big Fork.

Colors: Black with neon green splash with green
decals or sapphire with yellow decals.

Easton 6061 E9 double butted tubing
Bonded frame

A light weight
Creates a precisely aligned, very rigid
frame that gives the rider efficient energy
transfer and quick acceleration.

Tange Big fork

A stronger, stiffer fork that provides
excellent steering control

Matrix wheel system

The most advanced ATB tires and rims
available today provide superior strength
and traction.

Triple Tech™ top tube cable routing

Reduces mud fouling and allows easier
maintenance.

SPECIFICATIONS MODEL 7000

Sizes (in/cm)	15/38	16.5/42	18/45.7	20/51	22/56
Stand-over Height (in/cm)	27.95/71	28.0/71.2	29.1/73.9	30.7/77.9	32.6/82.9
Top Tube Length (in/cm)	20.7/52.5	21.7/55	22.3/56.6	22.6/57.4	23/58.4
Head Angle	70.5°	70.5°	71°	71°	71°
Seat Angle	73.0°	73.0°	73.0°	73.0	73.0
Chainstay Length (in/cm)	16.9/42.9	16.9/42.9	16.9/42.9	16.9/42.9	16.9/42.9
Seatpost Diameter (mm)	27.2	27.2	27.2	27.2	27.2
Seatpost Length (mm)	300	300	300	300	300
Crank Arm Length	170	170	175	175	175
Stem Length (mm)	105	105	120	135	150
Handlebar Width (mm)	560	560	560	560	560
Bottom Bracket Axles (mm)	(42/52/39, 3RT)	(Same for all frame sizes)			
Bottom Bracket Shell (mm)	68	(Same for all frame sizes)			
Seat Tube O.D. (mm)	34.9	14 Gauge	14 Gauge	14 Gauge	14 Gauge
Front Spoke Length	269	(Same for all frame sizes)			
Rear Spoke Length	266/268	14 Gauge	14 Gauge	14 Gauge	14 Gauge

GEAR RATIOS

	26	36	46
	52	72	92
	45	62	80
	40	55	70
	34	47	60
	29	41	52
	23	31	40

ALUMINUM TREK 6000

		Product Feature		Rider Benefit	
Series:	Off Road Performance	Easton 6061 E9 double butted tubing	A lightweight and extremely strong frame	Creates a precisely aligned, very rigid frame that gives the rider efficient energy transfer and quick acceleration.	
Construction/Materials:	Bonded/Easton 6061 E9 double butted aluminum tubing.	Bonded frame			
Component Group:	SunTour XC-LTD (Featuring: 7 speed Accushift Plus with X-Press levers, LTD post type cantilevers with BRS & short drop levers, XC-LTD triple crank with round PoweRings).	Cruise Control™ taper gauge fork Matrix wheel system	Triple Tech™ top tube cable routing	Superior handling and strength The most advanced ATB tires and rims available today provide superior strength and traction.	Reduces mud fouling and allows easier maintenance.
Additional Features:	Matrix wheel system with SingleTrack Comp 32 hole rims and Matrix Cliffhanger tires, True Temper Chrome-moly handlebars, Matrix Ener-Gel saddle, Matrix hard anodized seatpost, SR Low Fat sport pedals, Trek Cruise Control™ Fork.				
Colors:	Neon yellow with black splash with black decals or red with black decals.				
SPECIFICATIONS MODEL 6000					
		Sizes (in/cm)	15/38	16.5/42	18/45.7
		Stand-over Height (in/cm)	27.95/71	28.0/71.2	29.1/73.9
		Top Tube Length (in/cm)	20.7/52.5	21.7/55	22.3/56.6
		Head Angle	70.5°	70.5°	71°
		Seat Angle	73.0°	73.0°	73.0°
		Chainstay Length (in/cm)	16.9/42.9	16.9/42.9	16.9/42.9
		Seatpost Diameter (mm)	27.2	27.2	27.2
		Seatpost Length (mm)	300	300	300
		Crank Arm Length	170	170	175
		Stem Length (mm)	105	105	120
		Handlebar Width (mm)	560	560	560
		Bottom Bracket Axle (mm)	(42/52/39, 3RT)		(Same for all frame sizes)
		Bottom Bracket Shell (mm)	68		(Same for all frame sizes)
		Seat Tube O.D. (mm)	34.9		(Same for all frame sizes)
		Front Spoke Length	269	14 Gauge	(Same for all frame sizes)
		Rear Spoke Length	266/268	14 Gauge	(Same for all frame sizes)
			30	21	21
			31	31	40
			47	41	52
			60	52	46
			20	23	26
			31	27	24
			47	41	36
			60	52	46
			23	27	24
			47	41	36
			60	52	46
			20	23	26
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			47	41	36
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			23	27	24
			47	41	36
			60	52	46
			20	23	26
			31	27	24
			47	41	36
			60	52	46
			23	27	24

TREK 990

Series: Off Road Racing

Construction/Materials: Low temperature brazed/True Temper OX Ultra II heat treated double butted QP chrome-moly

Component Group: Shimano Deore XT
 (Features: 7 speed SIS with HyperGlide,
 SuperGlide triple crankset, Low Profile cantilever
 brakes with two finger SLR brake levers, Deore
 XT thumb shifter)

Additional Features: Matrix wheels with 32 hole SingleTrack Comp rims and Matrix Z-Axis tire system. Answer Taperlite bars, Selle Italia Turbo saddle, Tange Super Big Fork or 990 RS with Rock Shox, Matrix hard anodized seatpost.

SPECIFICATIONS MODEL 990

SPECIFICATIONS MODEL 990				
Sizes (in/cm)	15/38	16.5/42	18/45.7	20/51
Stand-over Height (in/cm)	27.9/71	28/71	29.6/75.1	30.8/78.1
Top Tube Length (in/cm)	20.3/51.6	21.3/54.1	22.2/56.4	22.6/57.4
Head Angle	70.5°	70.5°	71°	71°
Seat Angle	74.0°	73.5°	73.0°	73.0°
Chainstay Length (in/cm)	16.9/42.9	16.9/42.9	16.9/42.9	16.9/42.9
Seatpost Diameter (mm)	29.8	29.8	29.8	29.8
Seatpost Length (mm)	300	300	300	300
Crank Arm Length	170	175	175	175
Stem Length (mm)	105	105	120	135
Handlebar Width (mm)	530	530	530	530
Bottom Bracket Axle (mm)	(33.5/57/35, N/A)			
Bottom Bracket Shell (mm)	73			
Seat Tube O.D. (mm)	31.8			
Front Spoke Length	267	14/15 Gauge D.B.		
Rear Spoke Length	265/266	14/15 Gauge D.B.		
		(Same for all frame sizes)	(Same for all frame sizes)	(Same for all frame sizes)
		(Same for all frame sizes)	(Same for all frame sizes)	(Same for all frame sizes)
		(Same for all frame sizes)	(Same for all frame sizes)	(Same for all frame sizes)

GEAR RATIOS	24	36	46
12	52	78	100
14	45	67	85
16	39	59	75
18	35	52	66
21	30	45	57
24	26	39	50
28	22	33	43

TREK 970

Rider Benefit		Product Feature	True Temper OX Comp II double butted OD tubing	An extremely strong, rigid and responsive frame built to take intense off road riding and racing.
Series: Off Road Racing		Trek's new OD frame design		Larger diameter, thinner walled tubes that are both lighter and stronger.
Construction/Materials: Low temperature brazed/True Temper OX Comp II double butted OD chrome-moly.		Matrix wheel system		The most advanced ATB rims available provide superior strength and responsiveness.
Component Group: Shimano Deore DX & XT Features: 7 speed SIS HyperGlide, Deore XT, sw Profile cantilever brakes, Triple SuperGlide crankset, Rapid Fire Brake/Shift levers with Servo-Wave).		Tange Big fork		A stronger, stiffer fork with no additional weight
Additional Features: Matrix Wheels with 32 hole SingleTrack Comp rims and Cliffhanger tires, R alloy Powerbulge handlebars, Tioga T-Bone DS stem, SR Low Fat pedals, Matrix hard modized seat post, Tange Big Fork.		Triple Tech™ top tube cable routing		Reduces mud fouling and allows easier maintenance.
Colors: Black with white splash with white decals.				

GEAR RATIOS	SPECIFICATIONS MODEL 970				
26 36 46	Sizes	15/38	16.5/42	18/45.7	20/51
52 72 92	Stand-over Height (in/cm)	27.9/71	28/71	29.6/75.1	30.8/78.1
45 62 80	Top Tube Length (in/cm)	20.3/51.6	21.3/54.1	22.2/56.4	22.6/57.4
40 55 70	Head Angle	70.5°	70.5°	71°	71°
34 47 60	Seat Angle	74.0°	73.5°	73.0°	73.0°
25 41 52	Chainstay Length (in/cm)	16.9/42.9	16.9/42.9	16.9/42.9	16.9/42.9
26 36 46	Seatpost Diameter (mm)	29.8	29.8	29.8	29.8
30 31 40	Seatpost Length (mm)	300	300	300	300
	Crank Arm Length	170	175	175	175
	Stem Length (mm)	105	105	120	135
	Handlebar Width (mm)	560	560	560	560
	Bottom Bracket Axle (mm)	(33.5/57/35, N/A)			(Same for all frame sizes)
	Bottom Bracket Shell (mm)	73			(Same for all frame sizes)
	Seat Tube O.D.	31.8	14/15 Gauge D.B.		(Same for all frame sizes)
	Front Spoke Length	269	14/15 Gauge D.B.		(Same for all frame sizes)
	Rear Spoke Length	266/268	14/15 Gauge D.B.		(Same for all frame sizes)

TREK 950

Construction/Materials: Low temperature brazed/True Temper OX double butted OD tubing.

Component Group: Shimano Deore LX and DX

(Features: 7 speed with HyperGlide, DX Low Profile SLR cantilever brakes, Rapid Fire shifters with new three finger levers).

Additional Features: Matrix Wheel system with

SingleTrack Comp rims and Matrix Cliffhanger tires, Vetta Gel plus shock saddle, True Temper handlebars, Matrix TIG welded stem, SR Low Fat pedals.

Colors: Purple with white decals or white with black splash with red decals.

True Temper OX double butted OD tubing

A fun responsive frame that stands up to the beating of any trail.

Trek's new OD frame design

Larger diameter, thinner walled tubes that are both lighter and stronger.

Matrix wheel system

The most advanced ATB rims available provide superior strength and responsiveness.

Cruise Control™ taper gauge fork

Superior handling and strength Reduces mud fouling and allows easier maintenance.

Triple Tech™ top tube cable routing

SPECIFICATIONS MODEL 950

Sizes (in/cm)	15/38	16.5/42	18/45.7	20/51	22/56
Stand-over Height (in/cm)	27.9/71	28/73	29.6/75.1	30.8/78.1	32.4/82.3
Top Tube Length (in/cm)	20.3/51.6	21.3/54.1	22.2/56.4	22.6/57.4	23.5/58.4
Head Angle	70.5°	70.5°	71°	71°	71°
Seat Angle	74.0°	73.5°	73.0°	73.0°	72.5°
Chainstay Length (in/cm)	16.9/42.9	16.9/42.9	16.9/42.9	16.9/42.9	16.9/42.9
Seatpost Diameter (mm)	26.8	26.8	26.8	26.8	26.8
Seatpost Length (mm)	300	300	300	300	300
Crank Arm Length	170	170	175	175	175
Stem Length (mm)	105	105	120	135	150
Handlebar Width (mm)	560	560	560	560	560
Bottom Bracket Axle (mm)	(37.5/52/36, 3SN)	(Same for all frame sizes)			
Bottom Bracket Shell (mm)	68	(Same for all frame sizes)			
Seat Tube O.D.	28.6	28.6	28.6	28.6	28.6
Front Spoke Length	269	14 Gauge	(Same for all frame sizes)	(Same for all frame sizes)	(Same for all frame sizes)
Rear Spoke Length	266/268	14 Gauge	(Same for all frame sizes)	(Same for all frame sizes)	(Same for all frame sizes)

GEAR RATIOS

26	36	46
52	72	92
15	45	62
17	40	55
20	34	47
23	29	41
26	26	36
30	23	31

TREK 850

Series: Performance Off-Road

Construction/Materials: TIG welded/Tangential double butted Chrome moly

Comment Group: SubTaur XC

7 speed Accushift Plus, XCE Low Profile post type cantilevers with BRS Short Stop brake levers and X-Press shifters).

Additional Highlights: Matrix wheels with SingleTrack rims and CDX tires, Matrix Ener-Gel saddle, Triple Tech cable routing, Cruise Control Fork™.

Colors: Red with black splash and white decals

SPECIFICATIONS MODEL 850				
Sizes (in/cm)	14.5/37	16.5/42	18/45.7	20/51
Stand-over Height (in/cm)	27.6/70.1	28.5/72.4	29.4/74.6	30.8/78.2
Top Tube Length (in/cm)	20.9/53	21.7/55	22.3/56.6	22.6/57.4
Head Angle	69.5°	69.5°	70°	70.5°
Seat Angle	73.0°	72.5°	72.0°	72.0°
Chainsstay Length (in/cm)	16.9/42.9	16.9/42.9	16.9/42.9	16.9/42.9
Seatpost Diameter (mm)	26.2	26.2	26.2	26.2
Seatpost Length (mm)	300	300	300	300
Crank Arm Length	170	170	175	175
Stem Length (mm)	105	105	120	135
Handlebar Width (mm)	560	560	560	560
Bottom Bracket Axle (mm)	(32/52/39, 3T)			
Bottom Bracket Shell (mm)	68			
Seat Tube O.D. (mm)	28.6			
Front Spoke Length	263			
Rear Spoke Length	260/260			
	(Same for all frame sizes)			

GEAR RATIOS	28	38	48
13	56	76	48
15	49	66	83
17	43	58	73
20	36	49	62
23	32	43	54
26	28	38	48
30	24	33	42

TREK 830

Product Feature
TIG welded/Trek Chrome-moly frame

Rider Benefit
A responsive, durable frame
Double butted ATB Chrome-moly frame

Product Feature
Trek's new OD frame design
Rider Benefit
Larger diameter, thinner walled tubes that are both lighter and stronger.

Product Feature
Cruise Control™ taper gauge fork
Rider Benefit
Superior handling and strength

Product Feature
Triple Tech™ top tube cable routing
Rider Benefit
Reduces mud fouling and allows easier maintenance.

Product Feature
Quick release front & rear hubs
Rider Benefit
Easy transportation and maintenance

Series: Introductory Off Road
Construction/Materials: TIG welded/Trek Chrome-moly.
Double butted ATB Chrome-moly.

Component Group: Shimano 300 LX
(Featuring: 7 speed SIS HyperGlide, SuperGlide triple crankset, SLR cantilever brakes, Rapid Fire revers).

Additional Features: Araya VP-20 rims, Matrix CDX tires, quick release front and rear hubs, Matrix Ener-Gel saddle, Triple Tech cable routing, chrome-moly stem.

Colors: Yellow with black splash and black decals, or intense blue with white decals.

GEAR RATIOS

28	38	48	
13	56	96	
15	49	66	83
17	43	58	73
20	36	49	62
23	32	43	54
26	28	38	48
30	24	33	42

SPECIFICATIONS MODEL 830

Sizes (in/cm)	14.5/37	16.5/42	18/45.7	20/51	22/56	24/61
Stand-over Height (in/cm)	27.6/70.1	28.5/72.4	29.4/74.6	30.8/78.2	32.7/83.0	34.3/87.1
Top Tube Length (in/cm)	20.9/53	21.7/55	22.3/56.6	22.6/57.4	23.5/58.4	23.6/60
Head Angle	69.5°	69.5°	70°	70°	70.5°	70.5°
Seat Angle	73.0°	72.5°	72.0°	72.0°	72.0°	72.0°
Chainstay Length (in/cm)	16.9/42.9	16.9/42.9	16.9/42.9	16.9/42.9	16.9/42.9	16.9/42.9
Seatpost Diameter (mm)	26.2	26.2	26.2	26.2	26.2	26.2
Seatpost Length (mm)	300	300	300	300	300	300
Crank Arm Length	170	170	175	175	175	175
Stem Length (mm)	105	105	120	135	135	135
Handlebar Width (mm)	560	560	560	560	560	560
Bottom Bracket Axle (mm)	(32/52/35, 3P)					
Bottom Bracket Shell (mm)	68					
Seat Tube O.D. (mm)	28.6					
Front Spoke Length	263					
Rear Spoke Length	262/260					

(Same for all frame sizes)

ANTLOPE

TREK 820

Series: Recreational All-Terrain
Construction/Materials: TIG welded/Trek ATB
 Chrome-moly.

Component Group: Shimano 200 GS (Featuring: 7-speed SIS HyperGlide, SuperGlide triple crankset, SLR cantilever brakes, Rapid Fire levers).

Additional Highlights: Araya VP-20 rims, Matrix CDX 26 x 1.95 tires, Quick release front and rear hubs, Matrix Ener-Gel saddle, flat bars, chrome-moly fork.

Colors: White with black splash and blue decals, or black with white decals.

110mm Feature	TIG welded Chrome-moly frame	A stable, durable and reliable frame
Chrome-moly fork		
Quick release hubs		Easy transportation and maintenance
Flat handlebars		More aggressive looks and handling
Wide range of sizes		A good fit for everyone

SPECIFICATIONS MODEL 820

	14.5/37	16.5/42	18/45.7	20/51	22/56	24/61	17/43.2L	15/38 x 24
Sizes (in/cm)	14.5/37	16.5/42	18/45.7	20/51	22/56	24/61	17/43.2L	15/38 x 24
Stand-over Height (in/cm)	27.4/69.7	28.5/72.4	29.2/74.2	30.6/77.8	33.7/84.5	33.5/85.0	N/A/27	15/38.1
Top Tube Length (in/cm)	20.9/53	21.7/55	22.3/56	22.6/57.4	23.5/58.4	23.6/60	21.5	19.3/49
Head Angle	69.5°	69.5°	70°	70°	70.5°	70.5°	69.5°	69.0°
Seat Angle	73.0°	72.5°	72.0°	72.0°	72.0°	72.0°	72.5°	70.0°
Chainstay Length (in/cm)	17.2/46.6	17.2/46.6	17.2/46.6	17.2/46.6	17.2/46.6	17.2/46.6	17.2/46.6	16.6/42.1
Seatpost Diameter (mm)	26.2	26.2	26.2	26.2	26.2	26.2	26.2	26.2
Seatpost Length (mm)	300	300	300	300	300	300	300	300
Crank Arm Length	170	170	170	170	170	170	170	170
Stem Length (mm)	80	80	80	100	100	100	80	80
Handlebar Width (mm)	560	560	560	560	560	560	560	560
Bottom Bracket Axle (mm)	(32/52/35, 3P)	(Same for all frame sizes)	(Same for all sizes - except 238 for 24" wheel)	(Same for all sizes - except 238/236 for 24" wheel)				
Bottom Bracket Shell (mm)	68							
Seat Tube O.D. (mm)	28.6							
Front Spoke Length	263							
Rear Spoke Length	262/260							

(Same for all sizes - except 238 for 24" wheel)

GEAR RATIOS

21	35	47	59
24	30	41	52
28	26	35	45

TREK 800

	Product Feature			Rider Benefit
Series:	Recreational All-Terrain	TIG welded/ATB Chrome-moly.	A stable, durable and reliable frame	
Construction/Materials:	TIG welded/ATB Chrome-moly.	Quick release hubs	Easy transportation and maintenance	
Component Group:	Shimano M-100 (Featuring: 7 speed SIS HyperGlide, SLR cantilever brakes, SuperGlide triple crankset, Rapid Fire levers).	Modified ATB geometry	A more comfortable, upright position	
Additional Highlights:	Araya MF22 Rims, Matrix CDX tires, quick release front and rear hubs, Matrix Air-Flex saddle.	Wide range of sizes	A good fit for everyone	
Colors:	Black with green decals, or red with white decals.			

SPECIFICATIONS MODEL 800										
Sizes	14.5/37	16.5/42	18/45.7	20/51	22/56	24/61	17/43.2L	15/38 x 24		
Stand-over Height (in/cm)	27.4/69.7	28.5/72.4	29.2/74.2	30.6/77.8	33.7/84.5	33.5/85.0	N/A/27	15/38.1		
Top Tube Length (in/cm)	20.9/53	21.7/55	22.3/56.6	22.6/57.4	23/58.4	23.6/60	21.5	19.3/49		
Head Angle	69.5°	69.5°	70°	70°	70.5°	70.5°	69.5°	69°		
Seat Angle	73.0°	72.5°	72.0°	72.0°	72.0°	72.0°	72.5°	70.0°		
Chainstay Length (in/cm)	17.2/46.6	17.2/46.6	17.2/46.6	17.2/46.6	17.2/46.6	17.2/46.6	17.2/46.6	16.6/42.1		
Seatpost Diameter (mm)	26.2	26.2	26.2	26.2	26.2	26.2	26.2	26.2		
Seatpost Length (mm)	300	300	300	300	300	300	300	300		
Crank Arm Length	170	170	170	170	170	170	170	170		
Stem Length (mm)	80	80	80	100	100	100	80	80		
Handlebar Width (mm)	600	600	600	600	600	600	600	600		
Bottom Bracket Axle (mm)	(32/52/35, 3P)	(Same for all frame sizes)								
Bottom Bracket Shell (mm)	68	(Same for all frame sizes)								
Seat Tube O.D. (mm)	28.6	(Same for all frame sizes)								
Front Spoke Length	264	(Same for all sizes – except 238 for 24" wheel)								
Rear Spoke Length	262/260	(Same for all sizes – except 238/236 for 24" wheel)								

GEAR RATIOS	
28	38 48
36	56 96
49	66 83
58	73
52	66
47	59
35	52
30	41
26	35 45

MULTI-TRACK TREK 7900

Series: Performance Multi-Purpose

Construction/Materials: Bonded/Easton 6061-E9 double butted aluminum tubing.

Component/Group: Shimano Deore DX

(Featuring: 7 speed SIS HyperGlide, SuperGlide triple crankset, Low Profile SLR cantilevers, Rapid Fire shifters).

Additional Highlights: Matrix wheel system with Titan Tour rims, Matrix Multi-Track 7900 x 40c tires, Vetta Gel plus Shock saddle, SR PowerBulge handlebars, Matrix hard anodized seatpost, Triple Tech™ cable routing.

Colors: Red with white decals

SPECIFICATIONS MODEL 7900					
Sizes (in/cm)	15/38	16.5/42	18/45.7	20/50.8	22/55.9
Stand-over Height (in/cm)	28.5/72.4	28.6/72.7	29.7/75.4	31.3/79.4	33.2/84.4
Top Tube Length (in/cm)	20.7/52.5	21.7/55	22.3/56.6	22.6/57.4	23/58.4
Head Angle	70.5°	70.5°	71.0°	71.0°	71.0°
Seat Angle	73.0°	73.0°	73.0°	73.0°	73.0°
Chainstay Length (in/cm)	16.9/42.9	16.9/42.9	16.9/42.9	16.9/42.9	16.9/42.9
Seatpost Diameter (mm)	27.2	27.2	27.2	27.2	27.2
Seatpost Length (mm)	300	300	300	300	300
Crank Arm Length	170	170	175	175	175
Stem Length (mm)	100	100	120	120	140
Handlebar Width (mm)	520	520	520	520	520
Bottom Bracket Axle (mm)	(42/52/59, 3RT)				
Bottom Bracket Shell (mm)	68	(Same for all sizes)			
Seat Tube O.D.	34.9	(Same for all sizes)			
Front Spoke Length	297				
Rear Spoke Length	295/295				
	(Same for all sizes)				

GEAR RATIOS					
	28	38	48		
	13	56	76	96	
	15	49	66	83	
	17	43	58	73	
	20	36	49	62	
	23	32	43	54	
	26	28	38	48	
	30	24	33	42	

MULTI-TRACK TREK 750

Product Feature	Rider Benefit			
Brazed True Temper OX double butted Chrome-moly frame	Durable, lightweight frame that responds well both on or off-road.			
Trek's Multi-Track geometry	An upright, more comfortable riding position.			
Matrix wheel system	The most advanced rims available provide superior strength a responsiveness.			
Triple Tech™ top tube cable routing	Better performance and easier maintenance of cables.			
Series: Performance Multi-Purpose				
Construction/Materials: Low Temperature Brazed/True Temper double butted OX Chrome-moly.				
Component Group: SunTour XCE (Featuring: 7-speed Accushift Plus, new post type cantilevers with BRS, Triple cranksset with Round PowerRings).				
Additional Features: Matrix wheels with 32 hole Titan Tour rims and Multi-Track tires, Vetta Gel saddle with shock absorption, True Temper Chrome-moly bars.				
Colors: Black with white decals.				
SPECIFICATIONS MODEL 750				
Sizes (in/cm)	17/43	19/48	21/53,3	23/58,4
Stand-over Height (in/cm)	28.6/72.7	30.2/76.6	31.8/80.8	33.7/85.6
Top Tube Length (in/cm)	21.3/54	21.9/55.6	22.2/56.4	22.6/57
Head Angle	70.5°	71.5°	71.5°	71.5°
Seat Angle	73.0°	73.0°	73.0°	73.0°
Chainstay Length (in/cm)	16.9/42.9	16.9/42.9	16.9/42.9	16.9/42.9
Seatpost Diameter (mm)	27.2	27.2	27.2	27.2
Seatpost Length (mm)	300	300	300	300
Crank Arm Length	170	175	175	175
Stem Length (mm)	100	100	120	120
Handlebar Width (mm)	520	520	520	520
Bottom Bracket Axle (mm)	(32/52/39, 3T)			(Same for all frame sizes)
Bottom Bracket Shell (mm)	68			(Same for all frame sizes)
Seat Tube O.D.	28.6			(Same for all frame sizes)
Front Spoke Length	297	14 Gauges		(Same for all frame sizes)
Rear Spoke Length	295/295	14 Gauges		(Same for all frame sizes)

GEAR RATIOS

MULTI TRACK TREK 720

Series: Recreational Multi-Purpose

Construction/Materials: TIG welded/ATB Chrome-moly.

Component Group: SunTour XCM & XCT (Featuring: 7 speed XCT Acushift Plus and X-Press levers, XCT BRS cantilever brakes, XCM triple crank with round PoweRings).

Additional Features: Araya PX45 36 hole rims, Matrix Multi-Track tires, quick release front and rear hubs, Matrix Ener-Gel saddle, Alloy stem and seatpost.

Colors: Black with conch decals or purple with white decals.

SPECIFICATIONS MODEL 720						
Sizes (in/cm)	15/38	17/43	19/48	21/53.3	23/58.4	17/43L
Stand-over Height (in/cm)	26.2/66	27.9/70.8	29.9/75.9	31.8/80.7	33.7/85.6	N/A
Top Tube Length (in/cm)	21.1/53.6	21.3/54	21.9/55.6	22.2/56.4	22.6/57	21/53.3
Head Angle	70.0°	70.5°	71.5°	71.5°	71.5°	70.5°
Seat Angle	73.0°	73.0°	73.0°	73.0°	73.0°	73.0°
Chainstay Length (in/cm)	16.9/42.9	16.9/42.9	16.9/42.9	16.9/42.9	16.9/42.9	16.9/42.9
Seatpost Diameter (mm)	26.2	26.2	26.2	26.2	26.2	26.2
Seatpost Length (mm)	300	300	300	300	300	300
Crank Arm Length	170	170	175	175	175	175
Stern Length (mm)	80	80	100	100	100	80
Handlebar Width (mm)	560	560	560	560	560	560
Bottom Bracket Axle (mm)	(35/52/39, 3T)	(Same for all frame sizes)				
Bottom Bracket Shell (mm)	68					
Seat Tube O.D.	28.6					
Front Spoke Lengths	296					
Rear Spoke Lengths	296/294					
(Same for all frame sizes)						

GEAR RATIOS						
					28	38
					38	48
					An upright, more comfortable riding position.	
					Strong, responsive steering	
					Lightweight, strong rims designed especially for multi-purpose bikes.	
					Easy transportation and maintenance	

TREK 700

Series: Recreational Multi-purpose	Product Feature			Rider Benefit
Construction/Materials: TIG welded/Trek ATB Chrome-moly.	TIG welded Chrome-moly frame			A sturdy, dependable frame
Component Group: Shimano 200GS (Featuring: 7 speed SIS with HyperGlide, SuperGlide triple crankset, cantilever brakes with SLR, Rapid Fire shifters).	Trek's Multi-Track geometry			An upright, more comfortable riding position
Additional Features: Araya PX45 36 hole rims, Matrix Multi-Track tires, quick release front and rear hubs, Matrix Air-Flex saddle.	Araya PX45 rims			Lightweight, strong rims designed especially for multi-purpose bikes.
Colors: White with blue decals or sapphire with yellow decals.	Quick release front & rear hubs			Easy transportation & maintenance

Additional Features: Araya PX45 36 hole rims, Matrix Multi-Track tires, quick release front and rear hubs, Matrix Air-Flex saddle.

Colors: White with blue decals or sapphire with yellow decals.

GEAR RATIOS	SPECIFICATIONS MODEL 700									
Sizes (in/cm)	15/38	17/43	19/48	21/53.3	23/58.4	17/43L				
Stand-over Height (in/cm)	26.2/66	27.9/70.8	29.9/75.9	31.8/80.7	33.7/85.6	N/A				
Top Tube Length (in/cm)	21.1/53.6	21.3/54	21.9/55.6	22.2/56.4	22.6/57	21/53.3				
Head Angle	70.0°	70.5°	71.5°	71.5°	71.5°	70.5°				
Seat Angle	73.0°	73.0°	73.0°	73.0°	73.0°	73.0°				
Chainstay Length (in/cm)	16.9/42.9	16.9/42.9	16.9/42.9	16.9/42.9	16.9/42.9	16.9/42.9				
Seatpost Diameter (mm)	26.2	26.2	26.2	26.2	26.2	26.2				
Seatpost Length (mm)	300	300	300	300	300	300				
Crank Arm Length	170	170	170	170	170	170				
Stem Length (mm)	80	80	80	100	100	100				
Handlebar Width (mm)	620	620	620	620	620	620				
Bottom Bracket Axle (mm)	(32/52/35, 3P)						(Same for all frame sizes)			
Bottom Bracket Shell (mm)	68						(Same for all frame sizes)			
Seat Tube O.D.	28.6						(Same for all frame sizes)			
Front Spoke Lengths	296						(Same for all frame sizes)			
Rear Spoke Lengths	295/293						(Same for all frame sizes)			

TREK 2500

Series: Trek
Construction/Materials: Bonded/Double butted Graphite/Epoxy main tubes, graphite epoxy stays, aluminum lugs.

Component Group: Shimano DuraAce

(Features: STI levers, 8 speed HyperGlide, SuperGlide crankset, Super SLR double pivot brakes).

Additional Features: Matrix wheels with ISO-CII rims and CD6-K tires, Selle Italia Turbo saddle, SR FX anatomic handlebars, LOOK™ Carbo Pro pedals with ARC.

Colors: Natural carbon tubes and stays with polished lugs and fork with purple decals.

Product Feature:
Seven tube graphite epoxy frame

Xtend Design™
 Superior rigidity translates pedaling power efficiently to speed! Extremely lightweight frame minimizes effort.

Matrix wheels	Super quick and extremely durable wheels
Dura Ace 8 speed STI group	State-of-the-art shifting

Bonded frame	Creates a precisely aligned, very rigid frame that gives the rider efficient energy transfer and quick acceleration.
Classic road geometry	Time proven to give the most efficient and comfortable ride.

Trek bonded aluminum fork	Ultra light, responsive steering
LOOK Carbo Pro clipless pedals w/ARC	Efficient, powerful pedaling with Anatomical Recentering Cleat which allows the foot and leg to follow its most natural motion.

SPECIFICATIONS MODEL 2500

	47	50	52	54	56	58	60	62	
Sizes (cm)	47	50	52	54	56	58	60	62	
Stand-over Height (in/cm)	29.2/74.2	29.6/75.3	30.4/77.1	31.2/79.2	31.9/81.1	32.6/82.9	33.4/84.8	33.8/85.8	
Top Tube Length (cm)	51	53	53	55	55	57	57	58.5	
Head Angle	72.5°	73.0°	73.0°	73.5°	73.5°	73.5°	73.5°	74.0°	
Seat Angle	73.5°	73.5°	73.5°	73.5°	73.5°	73.5°	73.5°	73.5°	
Chainstay Length (cm)	41.5	41.5	41.5	41.5	41.5	41.5	41.5	41.5	
Seatpost Diameter (mm)	27.2	27.2	27.2	27.2	27.2	27.2	27.2	27.2	
Seatpost Length (mm)	230	230	230	230	230	230	230	230	
Crank Arm Length	167.5	167.5	170	170	172.5	172.5	175	175	
Stem Length (mm)	90	90	110	110	110	110	130	130	
Handlebar Width (mm)	390	390	410	410	410	430	430	430	
Bottom Bracket Axle (mm)	Dura Ace 113	(Same for all frame sizes)							
Bottom Bracket Shell (mm)	68	(Same for all frame sizes)							
Seat Tube O.D.	34.9	(Same for all frame sizes)							
Front Spoke Length	295	15 Gauge	(Same for all frame sizes)						
Rear Spoke Length	291/294	15 Gauge	(Same for all frame sizes)						

GEAR RATIOS

21	50	68
17	62	84
19	55	75
16	66	89
15	70	95
13	81	110
12	88	119

TREK 2300

Product Feature	Rider Benefit
Seven layer True Temper double butted carbon tubing	Extra strong, shock absorbing frame, incredibly light and stiff fiber
Matrix wheels	Super quick and extremely durable wheels
Bonded frame	Creates a precisely aligned, very rigid frame that gives the rider efficient energy transfer and quick acceleration.
Classic road geometry	Time proven to give the most efficient and comfortable ride.
Trek bonded aluminum fork	Ultra light responsive steering
LOOK carbon clipless pedals w/ARC	Efficient, powerful pedaling with Anatomical Recentering Cleat which allows the foot and leg to follow its most natural motion.

SPECIFICATIONS MODEL 2300						
Sizes (cm)	47	50	52	54	56	58
Stand-over Height (in/cm)	29.2/74.2	29.6/75.3	30.4/77.1	31.2/79.2	31.9/81.1	32.6/82.9
Top Tube Length (cm)	51	53	53	55	55	57
Head Angle	72.5°	73.0°	73.0°	73.5°	73.5°	73.5°
Seat Angle	73.5°	73.5°	73.5°	73.5°	73.5°	73.5°
Chainstay Length (cm)	41.5	41.5	41.5	41.5	41.5	41.5
Seatpost Diameter (mm)	27.2	27.2	27.2	27.2	27.2	27.2
Seatpost Length (mm)	250	250	250	250	250	250
Crank Arm Length	167.5	167.5	170	170	172.5	175
Stem Length (mm)	80	80	100	100	120	120
Handlebar Width (mm)	390	390	410	410	410	430
Bottom Bracket Axle (mm)	(32/52/53/5.3AB)					
Bottom Bracket Shell (mm)	68					
Seat Tube O.D.	34.9					
Front Spoke Length	295	15 Gauge				
Rear Spoke Length	291/294	15 Gauge				

GEAR RATIOS		
	53	39
13	81	110
14	75	102
15	70	95
16	66	89
17	62	84
19	55	75
21	50	68

COMPOSITE TREK 2100

Series: Race/Triathlon

Construction/Materials: Bonded/Double butted True Temper Graphite/Epoxy main tubes with aluminum stays.

Component Group: Shimano 105SC (Features: 7 speed SIS HyperGlide, SuperGlide crankset, double pivot Super SLR brakes).

Additional Highlights: Matrix wheels with ISO-CII rims and CD3 tires, SR Modolo anatomic handlebars, LOOK PP66 adjustable clipless pedals with ARC, Matrix hard anodized seatpost. Colors: Natural carbon main tubes with purple front and rear with white decals.

Product Feature

Seven layer True Temper double butted carbon fiber tubing

Extra strong, shock absorbing frame, incredibly light and stiff.

Shimano 105 SC group
Bonded frame

Super quick and extremely durable wheels

Trek bonded aluminum fork

Race performance parts at a true value

LOOK PP66 clipless pedals w/ARC

Creates a precisely aligned, very rigid frame that gives the rider efficient energy transfer and quick acceleration.

Classic road geometry

Time proven to give the most efficient and comfortable ride.

Trek bonded aluminum fork

Ultra-light, responsive steering

LOOK PP66 clipless pedals w/ARC

Efficient, powerful pedaling with Anatomical Recentering Cleat which allows the foot and leg to follow its most natural motion.

SPECIFICATIONS MODEL 2100

Sizes (cm)	47	50	52	54	56	58	60	62
Stand-over Height (in/cm)	29.2/74.2	29.6/75.3	30.4/77.1	31.2/79.2	31.9/81.1	32.6/82.9	33.4/84.8	33.8/85.8
Top Tube Length (cm)	51	53	53	55	55	57	57	58.5
Head Angle	72.5°	73.0°	73.0°	73.5°	73.5°	73.5°	73.5°	74.0°
Seat Angle	73.5°	73.5°	73.5°	73.5°	73.5°	73.5°	73.5°	73.5°
Chainstay Length (cm)	41.5	41.5	41.5	41.5	41.5	41.5	41.5	41.5
Seatpost Diameter (mm)	27.2	27.2	27.2	27.2	27.2	27.2	27.2	27.2
Seatpost Length (mm)	250	250	250	250	250	250	250	250
Crank Arm Length	167.5	167.5	170	170	172.5	172.5	175	175
Stem Length (mm)	80	80	100	100	120	120	120	120
Handlebar Width (mm)	390	390	410	410	410	410	430	430
Bottom Bracket Axle (mm)	(32/52/32, 3LB)							
Bottom Bracket Shell (mm)	68							
Seat Tube O.D.	34.9							
Front Spoke Length	295	15 Gauge						
Rear Spoke Length	291/294	15 Gauge						
	(Same for all frame sizes)							
	(Same for all frame sizes)							
	(Same for all frame sizes)							
	(Same for all frame sizes)							

GEAR RATIOS

	42	53
	87	110
	14	81
	102	
	15	76
	95	
	17	67
	84	
	19	60
	75	
	21	54
	68	
	23	49
	52	

TREK 1420

Product Feature	Rider Benefit
Easton 6061-E9 double butted aluminum tubing	A super stiff, lightweight frame, tough enough to endure the long haul.
Matrix wheels	Quick and extremely durable wheels
Shimano Deore DX Triple SuperGlide crankset	A range of gears wide enough to comfortably cover any topography.
Bonded frame	Creates a precisely aligned, very rigid frame that gives the rider efficient energy transfer and quick acceleration.
Classic road geometry	Time proven to give the most efficient and comfortable ride.
LOOK PP66 clipless pedals w/ARC	Efficient, powerful pedaling with Anatomical Recentering Cleat which allows the foot and leg to follow its most natural motion.
Trek bonded aluminum fork	Ultra light, responsive steering

GEAR RATIOS

SPECIFICATIONS MODEL 1420	
Sizes (cm)	47
Stand-over Height (in/cm)	29.2/74.2
Top Tube Length (cm)	51
Head Angle	72.5°
Seat Angle	73.5°
Chainstay Length (cm)	41.5
Seatpost Diameter (mm)	27.2
Seatpost Length (mm)	250
Crank Arm Length	170
Stem Length (mm)	80
Handlebar Width (mm)	390
Bottom Bracket Axle (mm)	(35/52/37.5, 3SB)
Bottom Bracket Shell (mm)	68
Seat Tube O.D.	34.9
Front Spoke Lengths	295
Rear Spoke Lengths	271/294

ries: Road performance/Light touring
onstruction/Materials: Bonded/Easton 61-E9 double butted aluminum.
omponent Group: Shimano 105SC/Deore DX features: 7 speed SIS HyperGlide, Super SLR double pivot brakes, SuperGlide triple crankset, Zore DX long cage derailleur).

additional Highlights: Matrix wheels with O-CII rims and CD 3K Kevlar belted tires, LOOK PP66 adjustable clipless pedals with ARC, Zetta Gel plus Shock saddle, Matrix hard anodized seatpost, SR X-stem.

olors: Glacial blue with raspberry decals.

ALUMINUM

TREK 1400

Construction/Material: Bonded/ Easton 6061-E9 double butted aluminum.

Component Group: Shimano 105SS (featuring 7 speed SIS HyperGlide, Super SLR double pivot brakes, SuperGlide crankset).

Additional Highlights: Matrix wheels with ISO-CII rims and CD3 tires, LOOK PP66 adjustable clipless pedals with ARC cleats, SR Modolo anatomic handlebars, Matrix hard anodized seatpost.

Colors: Champagne with purple decals.

Easton 6061-S9 double butted aluminum tubing

Matrix wheels
Bonded frame

A super stiff, lightweight frame, tough enough to take the rigors of racing.

Creates a precisely aligned, very rigid frame that gives the rider efficient energy transfer and quick acceleration.

Classic road geometry
LOOK PP66 clipless pedals w/ARC

Time Proven to give the most efficient yet comfortable ride.

Efficient, powerful pedaling with Anatomical Recentering Cleat which allows the foot and leg to follow its most natural motion.

Trek bonded aluminum fork

Ultra light, responsive steering

SPECIFICATIONS MODEL 1400						
Sizes (cm)	47	50	52	54	56	58
Stand-over Height (in/cm)	29.2/74.2	29.6/75.3	30.4/77.1	31.2/79.2	31.9/81.1	32.6/82.9
Top Tube Length (cm)	51	53	53	55	55	57
Head Angle	72.5°	73.0°	73.0°	73.5°	73.5°	73.5°
Seat Angle	73.5°	73.5°	73.5°	73.5°	73.5°	73.5°
Chainstay Length (cm)	41.5	41.5	41.5	41.5	41.5	41.5
Seatpost Diameter (mm)	27.2	27.2	27.2	27.2	27.2	27.2
Seatpost Length (mm)	250	250	250	250	250	250
Crank Arm Length	167.5	167.5	170	170	172.5	172.5
Stem Length (mm)	80	80	100	100	120	120
Handlebar Width (mm)	390	390	410	410	410	430
Bottom Bracket Axle (mm)	(32/52/32, 3LB)					
Bottom Bracket Shell (mm)	68					
Seat Tube O.D.	34.9					
Front Spoke Lengths	295	15 Gauge				
Rear Spoke Lengths	291/294	15 Gauge				
		(Same for all frame sizes)				
		(Same for all frame sizes)				
		(Same for all frame sizes)				
		(Same for all frame sizes)				

GEAR RATIOS						
					42	53
					13	87
					14	81
					17	67
					21	54
					23	49
					52	

Rider Benefit

Product Feature
Easton 6061 E9 double butted aluminum tubing

Product Feature
Matrix wheels
Bonded frame

Product Feature
Creates a precisely aligned, very rigid frame that gives the rider efficient energy transfer and quick acceleration.

Product Feature
Classic road geometry

Product Feature
Time proven to give the most efficient yet

Series: Race
Construction/Materials: Bonded/Easton 6061-E9 double butted aluminum.

Component Group: Shimano RX 100 (Featuring: 7 speed SIS HyperGlide, Super SLR double pivot brakes).

Additional Highlights: Matrix wheels with ISO-CII rims and CD3 tires, Vetta Gel plus Shock saddle, alloy seatpost, SR Modolo handlebars.

Colors: Yellow with black splash with black decals.

SPECIFICATIONS MODEL 1200

Sizes (cm)	47	50	52	54	56	58	60	62
Stand-over Height (in/cm)	29.2/74.2	29.6/75.3	30.4/77.1	31.2/79.2	31.9/81.1	32.6/82.9	33.4/84.8	33.8/85.8
Top Tube Length (cm)	51	53	53	55	55	57	57	58.5
Head Angle	72.5°	73.0°	73.0°	73.5°	73.5°	73.5°	73.5°	74.0°
Seat Angle	73.5°	73.5°	73.5°	73.5°	73.5°	73.5°	73.5°	73.5°
Chainstay Length (cm)	41.5	41.5	41.5	41.5	41.5	41.5	41.5	41.5
Seatpost Diameter (mm)	27.2	27.2	27.2	27.2	27.2	27.2	27.2	27.2
Seatpost Length (mm)	250	250	250	250	250	250	250	250
Crank Arm Length	165	165	170	170	170	170	170	170
Stem Length (mm)	80	80	100	100	100	120	120	120
Handlebar Width (mm)	390	390	410	410	410	430	430	430
Bottom Bracket Axle (mm)	(32/52/32 , 3LB)							
Bottom Bracket Shell (mm)	68							
Seat Tube O.D.	34.9							
Front Spoke Length	295	15 Gauge						
Rear Spoke Length	291/294	15 Gauge						

GEAR RATIOS

42	53							
13	87	110						
14	81	102						
15	76	95						
17	67	84						
19	60	75						
21	54	68						
23	49	52						

TREK 1100

Series: Introductory performance and touring
Construction/Materials: Bonded/Alcoa 6061

Construction/Materials: Bonded/Alcoa 6061-T6

Product Feature
SunTour Edge triple crank

Rider Benefit

Kid-friendly Benefit
Carefree touring and easy hill climbing

Aluminum.

Alcoa 6061-T6 tubing

A lightweight, durable frame stiff enough

Component Group: SunTour Edge (Featuring Accushift Plus, BRS brakes, Triple PowerRing crankset).

Matrix wheels
Bonded frames

Bulletproof yet lightweight wheel
Creates a precisely aligned wheel

Additional Highlights: Matrix wheels with Titan II rims and CD2 tires, Vetta Gel saddle, SRX stem, SR Modolo handlebars, Vetta Gel Saddle.

Classic road geometry

Time proven to give the most efficient yet comfortable ride.

Creates a precisely angled, very rigid frame that gives the rider efficient energy transfer and quick acceleration.

SPECIFICATIONS MODEL 1100

GEAR RATIOS

	32	42	52
13	66	87	108
14	62	81	100
16	54	71	88
18	48	63	78
21	41	54	67
24	36	47	59
28	31	41	50

ALUMINUM TREK 1000

Series: Introductory Road Performance
Construction/Materials: Bonded/Alcoa 6061-T6 Aluminum.

Component Group: SunTour Edge (Featuring: Accushift Plus, BRS brakes, PowerRing haimings).

Additional Highlights: Matrix wheels with Titan II rims and CD2 tires, Matrix Ener-Gel saddle, Alloy seatpost, SR Modolo handlebars.

Colors: Black with conch decals.

Rider Benefit
A lightweight, durable frame stiff enough for competition.

Matrix wheels	Matrix wheels	Bulletproof yet lightweight wheels
SR Modolo bars	SR Modolo bars	Added comfort from multiple hand positions

GEAR RATIOS

42	52	13	87	108	14	81	100	16	71	88	18	63	78	21	54	67	24	47	59	28	41	50	
Stand-over Height (in/cm)	29.2/74.2	29.6/75.3	30.4/77.1	31.2/79.2	31.9/81.1	32.6/82.9	33.4/84.8	33.8/85.8															
Top Tube Length (cm)	51	53	53	55	55	55	57	57															
Head Angle	72.5°	73.0°	73.0°	73.5°	73.5°	73.5°	73.5°	73.5°															
Seat Angle	73.5°	73.5°	73.5°	73.5°	73.5°	73.5°	73.5°	73.5°															
Chainstay Length (cm)	41.5	41.5	41.5	41.5	41.5	41.5	41.5	41.5															
Seatpost Diameter (mm)	27.2	27.2	27.2	27.2	27.2	27.2	27.2	27.2															
Seatpost Length (mm)	250	250	250	250	250	250	250	250															
Crank Arm Length	165	165	165	170	170	170	170	170															
Stem Length (mm)	80	80	80	80	80	80	80	80															
Handlebar Width (mm)	390	390	390	390	390	390	390	390															
Bottom Bracket Axle (mm)	(32/52/33.5, 3AB)																						
Bottom Bracket Shell (mm)	68	68	68	68	68	68	68	68															
Seat Tube O.D.	34.9	34.9	34.9	34.9	34.9	34.9	34.9	34.9															
Front Spoke Lengths	299	299	299	299	299	299	299	299															
Rear Spoke Lengths	296/298	296/298	296/298	296/298	296/298	296/298	296/298	296/298															

SPECIFICATIONS MODEL 1000

Sizes (cm)	47	50	52	54	56	58	60	62
Stand-over Height (in/cm)	29.2/74.2	29.6/75.3	30.4/77.1	31.2/79.2	31.9/81.1	32.6/82.9	33.4/84.8	33.8/85.8
Top Tube Length (cm)	51	53	53	55	55	57	57	58.5
Head Angle	72.5°	73.0°	73.0°	73.5°	73.5°	73.5°	73.5°	74.0°
Seat Angle	73.5°	73.5°	73.5°	73.5°	73.5°	73.5°	73.5°	73.5°
Chainstay Length (cm)	41.5	41.5	41.5	41.5	41.5	41.5	41.5	41.5
Seatpost Diameter (mm)	27.2	27.2	27.2	27.2	27.2	27.2	27.2	27.2
Seatpost Length (mm)	250	250	250	250	250	250	250	250
Crank Arm Length	165	165	165	170	170	170	170	170
Stem Length (mm)	80	80	80	80	80	80	80	80
Handlebar Width (mm)	390	390	390	390	390	390	390	390
Bottom Bracket Axle (mm)	(32/52/33.5, 3AB)							
Bottom Bracket Shell (mm)	68	68	68	68	68	68	68	68
Seat Tube O.D.	34.9	34.9	34.9	34.9	34.9	34.9	34.9	34.9
Front Spoke Lengths	299	299	299	299	299	299	299	299
Rear Spoke Lengths	296/298	296/298	296/298	296/298	296/298	296/298	296/298	296/298

CHROME-MOLY TREK 520

Series: Touring	
Construction/Materials: Low Temperature brazed/True Temper TX double butted Chrome-moly.	
Component Group: Shimano Deore DS (Features: 7 speed SIS HyperGlide, SuperGlide triple crankset, cantilever low profile SLR brakes, long cage rear derailleur).	
Additional Features: Matrix wheels with Titan Tour 36 hole rims and Matrix Cross Country Kevlar belted tires, Vetta Gel plus Shock saddle, SR X-stem and SR Modolo anatomic handlebars. Includes rear rack.	
Colors: Purple with white decals.	

SPECIFICATIONS MODEL 520		Product Feature			Rider Benefit
Sizes (in/cm)	17/43	19/48.3	21/53.3	23/58.4	A strong, rigid frame offering long lasting quality.
Stand-over Height (in/cm)	28.5/72.3	30/76.2	31.8/80.8	33.5/85.2	Brazed True Temper TX double butted Chrome-moly frame
Top Tube Length (cm)	54	55.5	56.5	57.5	Durability to provide smooth operation even under heavy loads.
Head Angle	70.5°	71.5°	71.5°	71.5°	Matrix wheels
Seat Angle	73.0°	73.0°	73.0°	73.0°	Touring geometry
Chainstay Length (cm)	41.5	43.0	43.0	43.0	Vetta Gel Plus Shock saddle
Seatpost Diameter (mm)	27.2	27.2	27.2	27.2	Added comfort for long hours in the saddle.
Seatpost Length (mm)	300	300	300	300	
Crank Arm Length	170	170	175	175	
Stem Length (mm)	80	100	100	120	
Handlebar Width (mm)	430	430	450	450	
Bottom Bracket Axle (mm)	(37.5/52/36, 3SN)	(same for all frame sizes)			
Bottom Bracket Shell (mm)	68	(same for all frame sizes)			
Seat Tube O.D.	34.7	(same for all frame sizes)			
Front Spoke Length	294	14/15 D.B.	(same for all frame sizes)		
Rear Spoke Length	291/293	14/15 D.B.	(same for all frame sizes)		

GEAR RATIOS	
	28 44 50
	12 63 99 112
	14 54 85 96
	16 47 74 84
	18 42 66 75
	21 36 57 64
	24 31 50 56
28	27 42 48

CHROME MOLY TREK 400

	Product Feature	Rider Benefit
Series: Introductory Road	Brazed True Temper RC double butted Chrome-moly frame	A strong, rigid frame offering long lasting quality.
Construction/Materials: Low temperature brazed/True Temper RC double butted chrome-moly tubing.	Matrix wheels	Bulletproof yet lightweight wheels
Component Group: SunTour Blaze (Features: 7 speed Accushift Plus, BRS brakes, crankset with round PowerRings).	Alloy seatpost, stem and bars	Weight savings
Additional Highlights: Matrix wheels with 32 hole Titan II rims and CD2 tires, Matrix Air-Flex saddle and Alloy seatpost.	Modified sport geometry	A versatile bike suitable for recreational riding and entry level racing.
Colors: White with red decals.		

SPECIFICATIONS MODEL 400	
Sizes (in/cm)	18/45.7
Stand-over Height (in/cm)	28.7/72.7
Top Tube Length (cm)	52.9
Head Angle	72.0°
Seat Angle	73.5°
Chainstay Length (cm)	41.5
Seatpost Diameter (mm)	27.2
Seatpost Length (mm)	250
Crank Arm Length	165
Stem Length (mm)	60
Handlebar Width (mm)	390
Bottom Bracket Axle (mm)	(32/52/32, 3A)
Bottom Bracket Shell (mm)	68
Seat Tube O.D.	28.6
Front Spoke Lengths	299
Rear Spoke Lengths	296/298
	15 Gauge
	15 Gauge

GEAR RATIOS	
42	52
87	108
81	100
71	88
63	78
54	67
47	59
41	50

VOLTAGE JAZZ

Series: Recreational All-terrain
Construction/Materials: Hand brazed/
 Hi-tensile steel.
Components: Shimano 200 GS triple crankset,
 Shimano Tourney front and rear derailleurs with
 6 speed SIS HyperGlide, Shimano 200GS
 cantilever brakes and levers.
Additional Feature: Matrix Air-Flex saddle,
 Weinman aluminum rims, Quick release front and
 rear hubs.
Colors: Metallic blue, or yellow with black
 splash.

Product Feature	Rider Benefit
Matrix Air Flex saddle	Added comfort, a special feature at this price point
High rise stem	Comfortable position
Tourney derailleurs with HyperGlide cogs	Accurate, smooth shifting
Quick release front & rear	Easy transportation and maintenance

SPECIFICATIONS		VOLTAGE					
Sizes (in/cm)		14.5/37	16.5/42	18/45.7	20/51	22/56	17/43.18L 15/38 x 24
Stand-over Height (in/cm)		27.4/69.7	28.5/72.4	29.2/74.2	30.6/77.8	33.7/84.5	33.5/85.0 27/68.6
Top Tube Length (in/cm)		20.9/53	21.7/55	22.3/56.6	22.6/57.4	23/58.4	21.5/54.6 19.3/49
Head Angle		69.5°	69.5°	70°	70°	70.5°	69.5° 69°
Seat Angle		73.0°	72.5°	72.0°	72.0°	72.0°	72.5° 70.0°
Chainstay Length (in/cm)		17.2/46.6	17.2/46.6	17.2/46.6	17.2/46.6	17.2/46.6	17.2/46.6 16.6/42.1
Seatpost Diameter (mm)		26.2	26.2	26.2	26.2	26.2	26.2

Series: Recreational All-terrain
Construction/Materials: TIG welded/HI-tensile steel.

Components: Shimano Tourney 6 speed HyperGlide SIS rear derailleur, Tourney front derailleur, Tourney shift levers, Dia Compe XCU cantilever brakes and brake levers, SR APC cranksset.

Additional Highlights: Matrix Air Flex saddle, quick release front hub.

Colors: White or black with silver splash.

Product Feature	Rider Benefit
Matrix Air Flex saddle	Added comfort, a special feature at this price point
High rise stem	Comfortable position
Alloy crank arms	Light weight, and a value at this price point
Quick release front wheel	Easy transportation and maintenance

SPECIFICATIONS LATITUDE						
Sizes (in/cm)	14.5/37	16.5/42	18/45.7	20/51	22/56	17/43.18L
Stand-over Height (in/cm)	27.4/69.7	28.5/72.4	29.2/74.2	30.6/77.8	33.7/84.5	33.5/85.0
Top Tube Length (in/cm)	20.9/53	21.7/55	22.3/56.6	22.6/57.4	23/58.4	21.5/54.6
Head Angle	69.5°	69.5°	70°	70°	70.5°	69.5°
Seat Angle	73.0°	72.5°	72.0°	72.0°	72.0°	70.0°
Chainstay Length (in/cm)	17.2/46.6	17.2/46.6	17.2/46.6	17.2/46.6	17.2/46.6	16.6/42.1
Seatpost Diameter (mm)	26.2	26.2	26.2	26.2	26.2	26.2

SYNTHESIS

Series: Recreational Multi-purpose

Construction/Materials: TiG welded/Hi-tensile steel.

Components: SR APC crankset, Shimano Tourney SIS 6 speed HyperGlide rear derailleur, Tourney front derailleur, Dia Compe XCU cantilever brakes and levers.

Additional Highlights: Matrix Air-Flex saddle, Weinman aluminum rims, quick release front hubs.

Colors: Black pearl

Product Feature	Rider Benefit
Weinman alloy rims	Lightweight, strong wheels
Tourney derailleurs with HyperGlide cogs	Accurate, smooth shifting
Quick release front & rear wheel	Easy transportation and maintenance

SPECIFICATIONS SYNTHESIS

Sizes (in/cm)	17/43	19/48	21/53.3	23/58.4	17/43L
Stand-over Height (in/cm)	27.9/70.8	29.9/75.9	31.8/80.7	33.7/85.6	N/A
Top Tube Length (in/cm)	21.3/54	21.9/55.6	22.2/56.4	22.6/57	21/53.3
Head Angle	70.5°	71.5°	71.5°	71.5°	70.5°
Seat Angle	73.0°	73.0°	73.0°	73.0°	73.0°
Chainstay Length (cm)	16.9/42.9	16.9/42.9	16.9/42.9	16.9/42.9	16.9/42.9
Seatpost Diameter (mm)	26.2	26.2	26.2	26.2	26.2

Product Feature	Rider Benefit
HyperGlide Tourney rear derailleur	Easy to learn, safe, efficient shifting
Dual Metal chainguard	Safety
U-brake	Excellent heel clearance, added durability
Reach adjuster on brakes	Better fit
Additional Highlights: Dual metal chain guard	
Colors: Boys frame-black Girls frame-raspberry	
Stand-over height: 23"/58.4cm	
Wheel size: 20"	

Series: Children's Mountain Bike

Construction/Materials: TIG welded/Hi-tensile steel.

Components: Shimano Tourney 6 speed SIS HyperGlide rear derailleur, Tourney shift levers, Dia Compe XCU cantilever front and U-brake :at, Dia compé brake levers.

Additional Highlights: Dual metal chain guard

Colors: Boys frame-black
Girls frame-raspberry

Stand-over height: 23"/58.4cm

Wheel size: 20"

JAZZ

Series: Children's

Construction/Materials: TIG welded/
Hi-tensile steel.

Components: One piece steel crank with 36
tooth chainwheel, Shimano coaster brake.

Additional Highlights: Removeable pads on top
tube, stem and crossbar. Velo padded saddle.

Colors: Girls-aqua with blue splash
Boys-orange with black splash

Stand-over height: 22"/55.9

Wheel size: 20"

Rider Benefit

Product Feature

Padded saddle

Comfort and safety

Full metal chainguard

Safety

Removeable pads on top tube, stem and
crossbar

Added safety

Colors

Kids love'em and they are highly visible
for safety

Rider Benefit	Product Feature	
Comfort and safety	Padded saddle	Safety
	Full metal chainguard	Added safety
	Removeable pads on top tube, stem and crossbar	Kids love'em and they are highly visible for safety
	Colors	Versatility
	Training wheels	
Series: Children's		
Construction/Materials: TIG welded/Hi-tensile steel.		
Components: One piece steel crankset with 36 tooth chainwheel Shimano coaster brakes.		
Additional Highlights: Training wheels. Velo double padded saddle, removeable pads for top tube, stem and crossbar pads.		
Colors: Girls--sparkle pink Boys--sparkle blue		
Stand-over height: 19 1/4"/48.9 cm		
Wheel size: 16"		

GLOSSARY

GENERAL TERMS:

Cassette systems: Combines the hub and freewheel into one unit. This saves weight and provides a stronger wheel and axle.

TREK TERMS:

Cruise Control Fork™: Trek's taper gauge fork that offers an outstanding blend of comfort and control while keeping weight to a minimum.

Function Specific Design™: Trek's design process that takes into account such variables as rider size, intended use and materials characteristics to specify a frame design that will provide the ultimate riding experience.

Optimal Dimension™ (OD): Trek's application of larger diameter, thinner walled tubing to our framesets. This offers increased strength with no weight penalty and in some cases substantial weight savings.

Triple Tech™: Trek's top tube cable routing on our mountain bicycles. Helps prevent fouling of the cables from mud and debris and allows easier maintenance.

Hard Anodizing: A chemical process that converts the surface aluminum to aluminum oxide which makes the rim stronger and more abrasion resistant.

Indexed Shifting: Preset shifting (ratchet style) that moves the chain one cog at a time. Each time the gear changes, the lever makes a firm click. Indexed shifting allows more precise gear changes.

Investment Casting: A fabricating process that produces extremely accurate and intricate shapes. Allows production parts to interface precisely.

Low Temperature Brazing: The process used to construct Trek's steel frames. As compared to welding, brazing produces a lighter and more resilient frame.

Efficiency: Efficiency is related to how much energy is required to produce forward motion. Energy is wasted by things like excessive frame flex, so stiffness is an important element in frame efficiency.

Squeeze Casting: An innovative casting process that combines the strength and toughness of forging with the precision of investment casting.

T6: A temper achieved by a heat