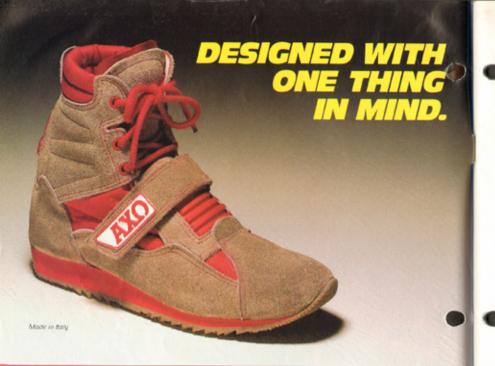
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## mountain bike

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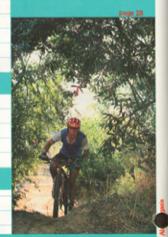
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### July-August 1986 Volume 2 No 1







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# editor's note

### Risk and Responsibility

All risk sports - rock climbing. backcountry skiing, surfing, scuba diving, mountaineering, spelunking, mountain biking, etc. - share one characteristic: personal responsibility in an uncontrolled environment. Yet paradoxically, while these sports enjoy healthy growth rates, we're living in an age when government seems more and more on the verge of illegalizing recreational injuries (but not work injuries), when insurance is all but mandatory on the one hand and completely out of reach financially on the other, and when one of the first thoughts that enters an injured person's mind for their nearest relations') is who he she they can sue. We seem to be torn between wanting, perhaps needing, greater responsibility for our actions and instantly looking for someone to blame when our house of cards collapses.

Not that the use of scapegoats is anything new. Religious have always relied upon real and symbolic scapegoats as the Maytag for sins. But today, we've refined and polished scapegoating to an exact and very profitable skill, litigation. Suing has become a way of life, a seductive albstross hereatening to bring our carefully contrived lifestyle to a screeching halt. The prospects for lives of entrepreneurial adventure are rapidly dimming. The bureaucratic hoops we're forced to jump through combined with the financial burdens of required insurance are slowly breaking recreational America's back.

What's needed is a lawyer-proof waiver form and a judicial system that understands and supports the concept of personal responsibility. We need to restore the value of risk and the responsibilities inherent to voluntarily accepted risk. Others argue that without our big brother bureaucratic geardians and forced insurance protection, consumers would be fleeced of their money with no recourse if injured and that only through the threat of litigation can innocent consumers be protected from unsafe practices by adventure entrepreneurs.

So? There's no guarantee a stock investor won't loose every cent, either. Life doesn't come with a seventy-five year, unlimited guarantee. If we can't sue a college for failing to prepare us for the pursuit of riches because we're not earning \$150,000 a year, why can we sue a tour guide or race organizer for injuries sustained in the pursuit of jolos? No one is forced to seek adventure; there's always the couch potato option.

But inherent to that persuit of risk is responsibility: to be accountable for what we do, to accept the consequences of failure, and to insure that our risk does not jeopardize others.

The reality of our litigious society is such that if Daedalus attempted his flight today, he'd probably sue the wax manulacturer for not properly informing his son on the dangers of melting wax. I suspect we're too far in already to make much of a dent in changing that situation but at least we can still exercise our own responsibilities when we play. That includes choosing who will lead us into an adventure just as we select our bankers, brokers, mechanics, employers, and employees and then accepting responsibility if we make a bad choice.

Exposure to risk is intrinsic to man's questing nature. Unfortunately the term risk is usually couched in negative connotations such as to risk injury or financial ruin or social rejection. But that isn't what's happening. The risk is incurred in pursuit of the exhibitation we experience when we achieve our quest.



when we overcome difficult and challenging conditions or obstacles, whether mental, physical, or financial makes no difference. But inherent to that pursuit of risk is responsibility: to be accountable for what we do, to accept the consequences of failure, and to insure that our risk does not jeopardize others and that we can get ourselves out of whatever we get into and if we can't, accept that

Backcountry cyclers in particular need to exercise responsibility. Mountain bikes enable us to quickly leave civilization far behind. But what happens if you left in a hurry and didn't bother with tools, food, sweater, or rain gear? Three hours later, you're deep in the hills with a broken rear derailleur, no chain tool and no food, you're hot and sweaty from riding hard and a cold rain sweeps in on a bitter wind. In a flash, you're suffering the first stages of hypothermia and an afternoon of frolic has suddenly turned into a life threatening situation.

What we do with our fives is our responsibility but given the realities of modern civilization, if we don't act in a manner that is perceived as responsible, society will step in and regulate those activities for us. Especially if those activities take place on public lands. Our use of public lands gives society the leverage to extract from us behavior they deem permissible. The mandatory wearing of life vests when running rivers is one example. Whether the wearing of it is wise or not isn't germane. Government has

continued

stolen that decision from the individual; they have assumed the mantle of responsibility for us whether we want

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Mountain Bike Magazine invites queries for both photography and stories. Materials unsuitable for publishing will be returned. Please include stamped, self-addressed envelope.

Copyright 1985 by Backcountry Publications. All rights reserved. them to or not. Consequently it behooves mountain bikers to accept responsibility for our actions or we may soon find the wearing of helmets mandatory and ever more trails closed to bikes. (An example of that Big Brother mentality is a proposed law in California that would give towers the power to decide what streets are safe for cyclists to ride. It's for the cyclists' welfare since they'll be protected from being bit by cars!)

Part of that responsibility includes caring for the trails we ride over. After a winter, the trails are often littered with downed branches or even whole trees. Somebody needs to clean if up. If we always leave it to the hiking community or the government then we can't be too surprised if pressure continues to build to ban us from those trails. There's no more effective way to make known our concern and love of the land than by participating in maintaining the lands we recreate on.

Along with that goes respect for others using those same lands. Since mountain bikers are already somewhat considered the bad guys in the backcountry, we have to, whether fair or not, treat any encounter with others with far more care than might normally be expected.

If we meet horse riders, no matter how much we may object to the damage they cause trails, it's us who have to stop and do nothing to scare the horses. If we're flying down a trail, having an absolute ball, we still have to remember that a hiker may be around the next bend and slow accordingly. The hiker is possibly already predisposed against mountain bikers and every action we do to reinforce that opinion is going to multiply against usmuch more rapidly than the opposite. It's as if any good impression we make will only count with that one individual but any bad impression will be the equivalent of ten people. It's not fair, it's certainly not equal treatment, it's just the way it is. But then no one ever claimed life is fair. The majority rules, or at least the loudest and best funded voices do.

In pursuit of these goals, Mountain Blue Magazine with the help of volunteers is going to do our small bit by building what may be the first trail on Forest Service land designed for mountain biking and built by mountain bikers. This isn't going to be some little token trail done to make a point. It will be a major biking trail in the Crested Butte area, one of the most spectacular in the midst of spectacular trails. Hopefully it will be the forerunner of many trails to come in the future, not just in the Crested Butte area but all across the country.

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# mark slate-

### Bike Fit.

A bicycle has performance requirements unto itself. Its personality is dependent on wheelbase, chainstay length, head tube angle and fork rake, bottom bracket height, and seat tube angle. The rider's points of contact with the bike - the feet, hands, and seat - determine the "fit".

In adjusting a bike's fit, the first dimensions to determine are crank length. and, if you use them, too clip depth. With or without toe clips, your optimal pedaling position is with the ball of your foot directly over the pedal spindle. Crank length is a matter of preference. Shortlegged riders generally prefer 170, 172.5, or 175 mm cranks. Riders with long legs prefer 175mm or 180mm. While there is a formula generally used to establish crank length for road riding, mountain bikers have tended to use a slightly longer crank for the increased leverage. Road riders want a crank length for maximum efficiency when spinning while off-roaders usually pedal at slower cadences.

After establishing your proper foot position, next determine where you want the saddle. I've found that the standard cycling practice of placing the saddle so the front of the rider's knee is directly over the pedal spindle works best for me. That position is established by dropping a plumbline off my leading kneedap to the pedal when the cranks are horizontal and the bike is on a level surface. Since mountain bikers spend relatively little time on level terrain compared to roadies, be sure to adjust your saddle according to what suits you for ascending and descending. (Apparently there is also some evidence a saddle position that places the knee forward of the pedal spindle can cause knee injury.)

The seat tube angle affects where you'll want the saddle on its rails. Most saddle rails provide approximately two inches of

fore and aft adjustment, the equivalent of four degrees of seat tube angle for the average rider. I've found that for myself, a neutral position works best for the range of conditions I generally ride. I prefer a seat tube that's neither too steep nor too shallow and with a correspondingly neutral saddle position. But many other knowledgeable riders prefer a relatively steep seat tube with its more aggressive riding position.

Two more saddle adjustments are tilt and height. Saddle tilt is critical for rider comfort. If the nose is too low, you'll find yourself constantly having to push yourself away from the handlebars to keep from sliding off the saddle. If the nose is too high, you may experience the dreaded crotch numbness! Practically all riders prefer the nose and tail level or the nose slightly higher.

An incorrect saddle height can adversely affect your knees. Too low means less than total pedaling efficiency while too high can cause hyper-extension of the knee joint. The normally preferred adjustment is with your leg just shy of being fully extended at furthest reach. The standard method for checking this is to have someone hold the bike upright while you, with your heels placed on each nedal. pedal backwards. If your body is bobbing from side to side as you spin, the saddle's too high. You want your leg just about straight at the bottom of each stroke.

The final adjustment is the handle-bars. While strictly a matter of personal preference, their reach and height do affect a bike's handling. If the reach is too long, you may find yourself leaning on the handlebar heavily while uncomfortably stretching your back and arms. This can diminish front end control and will result in undue fatique. Too much weight on the handlebars is also caused by their being

too low relative to the saddle. When that's the case, downhilling can get tricky in a hurry with the front end over-reacting to the slightest steering movement.

A good height for performance riding is with the handlebar at arm's length when climbing out-of-the-saddle with your back and arms in a relaxed and natural posture and your weight balanced on the cranks. Casual riders usually prefer a higher handlebar position for a more erect posture when seated.

The majority of riders seem to prefer a twenty four inch handlebar width. If you plan to cut your bars down, take small amounts off each end then test the results. Avoid the tendency to overdo it. You can't put it back on and a little bit goes a long

Placement of brake levers and shifters should follow the line of your forearm. The wrist and hand should fall naturally to the grip without contortions. The fingers and thumbs should find the brake levers and shifters without moving your arm appreciably. You should also be able to shift while braking under rough riding

The component that has the most to do with rider positioning is the handlebar stem. While mass-produced units are often sadly lacking in versatility, there is one manufacturer providing inexpensive quality custom-made stems that place the handlebar in virtually any location you desire, Ross Shafer of Salsa Cucles, His stems are available at mountain bike shops throughout the country.

My thanks to Scot Nicol of Ibis Cycles for his knowledge and input.



to position the lever exactly where you want it. The GC 282 still retains the classic features of the 250 lever, like allen key fittings, and a slotted bracket/adjusting barrel/ lockring assembly for easy cable installation. The lever arms are hand polished and clear

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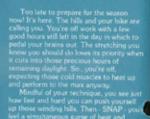
rel adjuster. By rotating the eccen-

tric adjusting barrel, the pivot point

through a circular range of

of the arm can be moved





muscle followed by relentless pain, In a millisecond, you know this was too intimate to be a snapping brake cable. This time it was your hamstring and you'll spend the next six weeks painfully realizing the importance of this large, not or trivial muscle on the back of your thigh. It's amazing how this momentery incident can totally change the course of your sunner. Whether it's your hamstring, achilles tendon, or whatever, well in fifter effectively our of arction.

to get a full season of riding in. The weeks

watch your friends ride off mot the hills while you stay home scing and rehabilitating your injury.

The prime motivation of mountain biking probably is not optimal physical health. It's the excitement - that thrill we experience from being on the edge. But by eliminating stretching from your life, as active as you are, you set yourself up for the inevitable injury. Too many of us don't realize how taxing mountain biking is on your bodies. This committees cross younger. our bodies. This sometimes convenient lack of awareness can lead us into big

rce. The fatigue we experience from eloping or redeveloping dormant scles is an obvious non-threatening e. Still we should work into shape

he repetitious overloading of certain uscle groups can lead to a structural real-down of the microscopic muscle bers, in turn creating a weak point within the muscle. With continued usage, this in lead to a variety of serious muscle aris, tendonies, etc. Muscle damage is usally accompanied by inflamation which turn leads to further tissue damage. Body awareness and a specific

etching regimen practiced daily will unterbalance the strain of frequent

and reducing the chance of many,
But not all stretching is necessarily
beneficial. Ballistic stretching consists of
brief intervals of stretching and
contracting, called "bouncing", and can be
self-defeating. As a defense mechanism
against the rapid extremes of lengthening
and contracting, ballistic stretching often
causes muscles to contract even further.
This style of stretching - alone - has a

most effective in injury prevention is of a "static" nature. This is the long, slow muscle tightness created by cycling and improves the range of motion around joints. Muscle tension is alleviated, performance is enhanced, and the risk of airury reduced.

To reduce the risk of injury, devote a minimum of ten minutes to stretching daily. If you're only going to stretch once a day, studies indicate that post exercise

day, studies indicate that post exercise stretching is the most effective in the prevention of injury. Even better is to also

awareness and resser borning are 'A'
healthy body is not a purchasable
commodity. It is an asset to be earned
through devotion, and body awareness.
While riding, pay attention to your
position. Fode with your back as extended
as is comfortable. Think about where your
hot spots for injury are - where you hold

tension. The excitement of cycling generates tensions we often hold in areas the the neck that don't need to be tense. like the neck that don't need to be tense. Find those places and soften them. That low, crouched, hooked head stance when climbing manifests itself in upper body tatigue. For relief during a ride, exercises three and four are excellent for the arms, neck, upper back, and shoulder areas. So next time you're out for a ride, give your body a break and take ten minutes to stretch and relax your muscles. You'll love





# Migratory Patterns and Evolutionary Trends in the Adventure Cyclist

Bodlish in the saddle and out of the main stream



Fifteen years have passed since I was a San Francisco milkeman - driving a refrigerated bottail truck, walking the streets of North Beach and riding the elevators of the financial district, wearing a starch white uniform and delivering cottage cheese, yoguet, whipping cream, and Rose Milk.

Now, splattered with mud, I write this while sitting on a stump next to Domingo Springs, elevation 5,000 feet, somewhere near the headwaters of the Feather River's North Fork. We've just completed a 35-mile loop south of Lassen Volcanic National Park's border. This is where the Sierra Nevadas butt up to the Cascades, a great place to explore and get fifthy, for single-tracking, ice caving, hot spring bathing, and gesser watching.

The metamorphosis from lowland urbanite to mile high ridge runner was brought on by my love of cycling. In early 71, a skimp-tire bicycle sent me exploring to the north, east, and south of The City. Each successive expedition led to rougher and ever more remote roads while the pleasure factor multiplied exponentially.

But something always seems to come along to moderate the ecstasy, cut short the orgasm. Sure enough, my cycling forays were no exception. I began pushing the limits of urban hospitality. Southern Pacific Railroad, Pacific Gas and Electric and Water District employees went out of their way to chase me down and explain that I was on private property and having too much fun. An urban fringe rancher in Sonoma County fired shots into a small cloud above my head as I rode along a ridge near his ranch. Another rammed his GMC truck right through his own locked gate only moments after I had carefully crawled over the same gate with my bike on my shoulder. Verily, I was impressed: "Yes Sir! I do understand this is your land. these are your cows and I have no Damn business being in here with them. Yes Sir! I am leaving, Pronto!"

Did he expect to find me with Buck knile open, quartering his prize bull and stuffing the meat into my parniers? On another occasion, the Contra Costa County Sherill sat me down in his patrol car and for fifteen minutes lectured me on the seriousness of my offenses: "Gate hopping" and "Cattle harassment".

It was time to have a serious conference with myself. So what if I was making over ten bucks an hour, had a good deal on my rental, and lived amidst a cultural carmival? What was I doing smack in the middle of a one hundred-mile stretch of high priced Pacific Coast real estate surrounded by millions of motorheads all living at a frantic pace inside webs of barbed and electric wire.

My priorities shifted significantly during that summer of '71. My car, a '63 Meteor, was dying, the inevitable result of too many hours idling along too many clogged freeways during my years of city living. My only escape, the only machine capable of making positive attitude adjustments with my psyche, was my bicycle. It begged for quiet roads, room to roam, and fewer brushes with Neurotic Urban Motorists (the N.U.M.).

I left the car in the city and moved by bicycle to the Kern River Canyon near the southern end of the Sierra Nevadas. Earning the rent by painting and pruning the landlord's ranch and working part time on the local ski hill, I made enough to get by.

I had decided to be time-rich and adventure-wealthy. I invested (rather than spent) most of my time exploring logging roads, studying maps, and wandering to the ends of unmapped spurs.

Friends felt sorry for me, advised me to do some "real" travelling: New Zealand ("the South Island is quiet and wild with lots of trails"), the Alps ("you could follow the routes of the European classic tours"). Scandinavia ("the hills of Norway will get you in top shape), or Nepal. Then I'd set them down on my porch, open a couple of beers, and tell them about the colors in Jawbone Canyon, the meadows near the top of Portuguese Pass, the panorama from Bodfish Peak, and a cool draught of crystal water from Saddle Springs. alfornians love to trek to small villages alfway around the clobe but show little interest in the wild and wondrous nooks and crannies of their own backyard.

The California outback is laced with a million miles of dirt roads and unlenced

trails. From the sage speckled shores of Lake Isabella in the south to the pine needle matted forest floor that cradles Lake Almanor at the North end, the 400 mile long Sierra Nevadas (which consists of 90% public lands) are the most cyclist friendly of North America's great ranges. The majority of its roads are free of ice and snow more than six months a year.

I'm now living at the northern end of the Sierra range where there are drinkable springs, refreshing lakes, and spectacular canyons along almost any ride you could dream up. Which brings me back to this cedar stump next to Domingo Springs, a piece of paradise where icy-clear water gushes from under a group of boulders on the south slope of Lassen Volcanic National Park. This place is my choice for "center of the universe" - a sacred spot. We'd been searching for the old Chinese water ditch constructed between Spencer Meadows and Wilson Lake along the ridge of Wild Cattle Mountain. Instead, we discovered the legendary ice caves of the Lost Creek Plateau and a hot geyser spouting from the volcanic earth near Willow Lake then took a break at Domingo Springs.

I was brought to this place by my bicycle. It's also what brought me to the mountains to live. The spare room in our cabin is full of bike packing, hiking, and ski equipment and other essential tools for living the time-rich life. Naw, we don't own a couch, color TV, VCR, phonograph, or many of the other appliances of modern American homes. I make half the per-hour wage I made driving a Foremost milk truck fifteen years ago in The City and work less than half the hours but, for me, this is living! Having made the break, I now find it difficult to understand why anyone who's having a serious affair with a bicycle willingly submits to confinement within a web of high-voltage overhead wires and barbed fences, all the while tightroping along eroding edges of blacktop teeming with impatient motorheads. Life is too precious to put up with all that. Especially with the outback awaiting any explorer's tread who's searching for his or her own "center of the universe", who's willing to pedal away from the "real world".



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### **Profile**

On May 14 of this year, Ned Overend and his wife became parents. Such news is normally of little interest to anyone other than the parents and their respective families. But in this case, Ned's becoming a parent may be of more interest to his fellow bike racing competitors than to his immediate friends

For a man who is one of the two too mountain bike racers in the country, the appearance of a daughter may wreck havoc with his best laid training and racing plans. Such disruptions are a reality faced by every competitor who's become a parent including such champions as Phil Mahre and John McEnroe. So the summer of '86 could prove to be interesting for the Schwing mountain bike racing team's superlative leader.

Not only is he now a father, he's also turning thirty-one, certainly not middle aged but nevertheless he does give up nine ears to the current NORBA Champion. Joe Murray. And in a sport that is becoming more and more competitive. where the demands of traveling, training, and fulfilling obligations to sponsors increase every year, and yet one in which the financial rewards are modest at best. the advantage seems to lie with bachelorhood and youth. It's a lifestyle that does not readily lend itself to the family hearth. Yet despite these acknowledged obstacles. Ned is if anything more enthusiastic about racing than ever.

Fortunately his wife Pam knew what she was getting from the beginning: a man who loves competition, who loves winning. and who loves training. They met when Ned was training for the Ironman. His athletic regimen hasn't abated since. In fact, even when she was in the early stages. of labor, Ned was off on a training ride, though a short one that led directly back to her side.

"Ned moved to Durango and quickly became a well-known runner. Twice, he finished second in the Pikes Peak marathon, possibly the most grueling race there is, some seven thousand vertical feet to the summit of a 14,000-foot peak then back down, twenty-six miles total distance," John Glover is one of Ned's losest friends. He's also manager of the Outdoorsman Bike Shop in Durango where Ned is assistant manager.

### Ned Overend



"He's always worked. His sponsorship by Schwinn is fairly recent. He was an auto mechanic specializing in transmission repairs when he first lived here. He trrained in his spare time. He set a record in the Estes Park, Colorado triathalon that may never be broken. He also hurt himself doing so and that really started his bike racing career. The only event he could do without pain afterwards was ride so he started racing. We had some pretty strong riders in the local bike club but Ned cleaned up his first time out. It was even't a contest. He didn't even have a racing bike, just some old 10-speed. He was racing Category Four at the beginning of the '82 season but by the end, was a Cat. One. He won every race he entered. The guy was incredible.

"He guit fixing cars and started working in the bike shop in '83. That was the summer we got into mountain bikes. We had these fifty-pound monsters we put together, real dogs. We thought we were hot stuff. We're a Schwinn shop and shortly thereafter, they sent us some Sierras which we all promptly bought. Ned loves hills and mountain bikes were ideal for him. He flew. But he was still a roadie and had his eyes set on the Coors. We started contacting teams to find a spot for him. His record was impressive enough that Raleigh was interested and offered him a spot. Then two weeks before the race, he was badly hurt in a crash during a race near Boulder."

The pack was flying down a caryon at over 50 mph when Ned and Roy Knickman somehow collided with spectacular results. Roy suffered a bad concussion while Ned lost acres of skin. Ned's head was saved by the hard-shell helmet he always wears. At the time, some racers jumped on Ned's case when he

He set a record in the Estes Park, Colorado triathalon that may never be broken. He also hurt himself doing so and that really started his bike racing career.

managed to rejoin the pack because of his rookie status.

"Hey, that was just an emotional reaction to a situation that happened when everybody was at a lever pitch of intensity. We're all good friends now and have been for years. It was just one of those things that can happen during any competitive event and nothing more." Two weeks later, still recovering from the crash, Ned raced in the Coors for Raleigh.

Why he didn't pursue the road career he seemed destined for rather than mountain bike racing is an obvious question. That's where the money and team sponsors are.

"Well, everybody has different strengths. Road racing is really difficult for me. So much of the racing in the states is over flat criteriums and circuits. My strength is hill climbing. That was true when I was running too. Mountain bike racing suits me."

But why Ned races off-road instead of on goes well beyond his abilities on hills. He simply prefers the Idestyle mountain bike racing enables him to follow. Joining a road team, and he's talked to Schwainn about that possibity, would mean a total dedication to racing. He'd be constantly traveling and competing. That's something he's not willing to do.

"Mountain bikes let me race on weekends. I fly our of Durango on Friday or Saturday morning then return Sunday night or Monday morning. I spend the week at home and working. Road racing demands too much time."

His relationship with Schwinn came about almost accidently. Pem went to California to go to school so Ned decided to race the Pacific Coast Series. His bike was a Schwinn High Sierra from the shop. He won the first race.

John Glover then called up Fred Teeman at Schwinn and told him the Outdoorsman was a Schwinn dealer, that Ned was racing on a Schwinn, that he'd won the first Pacific States Series, and about his astounding road racing career. Fred agreed to keep an eye on his results. Ned proceeded to win the second race. In fact, he went on to win all four races. Fred also signed him to a contract and Ned became a one-man off-road race team.

I asked him if racing for Schwinn was something less than prestigious considering Schwinn's reputation amongst cycling aficionados as a production bicycle company catering to the low end of the market.

"Well, perhaps initially. I suppose like most people, I associated Schwinn with paper boys. But it wasn't long before I changed my mind. Sure, they have a complete line of bities for the low end buyer, both off-road and on, but Schwinn's basic design philosophy is performance oriented. A lot of people forget that the Paramount is a Schwinn. And the Paramount is not a case of Schwinn's jumping on a bandwagon. They were building Paramounts long before most of today's bicycle companies even existed."

But, yeah, Schwinn has an image problem whether deserved or not and they're working hard to change that. Their road racing team is excellent, one of the best. The engineers listen to the riders and that's definitely improving the line. It's not something they're doing just for publicity though that's certainly a motivation. Racing is Schwimis's test bed. Now they're coming out with the Paramountain, a competition mountain bike I belped design. The Paramountain will stand right up there with the finest off road bikes made. So if you look closely at Schwimis's bikes, you'll be impressed and yes, they still build naper boy delivery models."

Though Ned can come across as a company man, his support for Schwinn is sincere. They were the first major company to offer me a sponsorship and they've stood by me ever since. The most important factor for a racer is the umbilical cord between racer and company. Fred has been superb and quite frankly I'm grateful for what he's done for me. Whether I win or lose, he's always been 100% supportive. Few people realize that Schwinn is really quite small and every one from Ed Schwinn on down is readly accessible.

The been approached by quite a few teams interested in my riding for them and I certainly appreciate the complement; that is increased my market value and French has appreciated that. But quite frankly, my first loyally is to Schwinn and as long as we can continue to, work together, and I see no reason to think otherwise, then I'll continue riding for Schwinn. They've been good to me, their products are excellent, and I enjoy working with them. There's little else a racer could eak for."

According to Fred Teeman, "far beyond Ned's value to Schwinn as one of the top off-road racers is his character. I've never seem him really upset about any race results though I know he's been deeply disappointed at times. The '85 NORBA Nationals were a perfect example. I know he wanted to win there very badly. He went out from the start to dominate the race from beginning to end. But then he hit a rock after completing the first lap and flatted. All of Gracers probably would have kicked the rock, his bild, and anything else that crossed his path and out the race?

"Ned just quietly switched tubes as quickly as he could and jumped on his bike and reemtered the fray. Effectively he'd lost the race at that point. But not only did he continue on, he made up time and eventually finished fifth, a remarkable accomplishment under the circumstances. Nad despite his disappointment at not winning or at least competing with Joe and Roy right to the wire, he was gracious afterwards and readily answered

such as this one written about him is something he'd probably just as soon not see happen. But he also understands people are naturally curious about the top competitors in any sport. Fame is simply one of those things that goes along with winning. And Ned enjoys winning. He also understands companies' motivation in sponsoring racers so he's a

He also understands companies' motivation in sponsoring racers so he's a willing participant in interviews. Questions are answered thoughefully, honestly, and at length. In short, he's a man who has fully accepted the responsibilities that go along with his racing.

According to John Glover, "People in Durango are proud of him. Someone's always congratulating him about one thing or another, people who he has no idea who they are though they call him by name, and he never fails to respond to them. He's far and away the shop's best salesman. He's given all of us who work in the shop a level of credibility we might not have otherwise and our sales reflect that. But I think what really impresses people is that he's just a regular guy. His success has not altered his basic personality at all. He's as likely to be the one to walk down to the bakery in the morning for shop snacks as anyone else. Or if some distraught mother rushes in with her child's broken bicycle followed by the boy or girl in tears, Ned will immediately take the bike and fix it while they're waiting. He's really the shop's best asset; not so much because of his racing though that is part of it but because of who he is as a person. He's tremendously respected within the community.

Where all this is will lead not even Ned knows. He'd like to capitalize on his racing success but how that might be he doesn't know. He does know he has no interest in moving to a major city yet he would like to continue within the industry. He's also not too concerned at the moment.

"I figure I can race for another five years or so. I want to. I'd also like to compete again in triathalons. I've talked a little bit to Schwim about their sponsoring me as kind of a jack of all trades competitor, mountain bike racing, some rough aracing, and racing in triathalons. The latter might be ideal for me considering my running and biking abilities. But I don't know. We'll just see where it goes."

Ned's a bit of an oddity in the final analysis. He really is just another regular guy except he has this incredible competitive drive. He performs at the limits yet he's astoundingly conservative. His trademark is a hard shell helmet and



anybody's questions. I suppose this may

sound somewhat corny considering the

"macho" image of mountain bike racing

a sportsman and a gentleman and

is proud to be associated with him."

was completely out of reach. Ned

but my best description of Ned is that he's

everyone within the Schwinn organization

When asked why he continued racing

when there was little doubt that first place

responded with typical candor. "Well, it

was a good workout. I'd trained hard for

the race, had gone to a lot of effort and

expense to get to the race, and wasn't

I would have just been hanging around

Maybe I had no chance of catching Joe

one else. I enjoyed pressing to my limits

every one in front of me knew I was still

kept on. That's all.

love pushing myself and competing.

about to not complete the race. If I'd quit,

feeling bad, maybe even sorry for myself,

while still pumped up with unused energy.

So I kept racing. The course was fun and I

and Roy but I could still race against every

and passing other racers and knowing that

there and moving up. I love competing so I

His fame as a mountain bike racer,

while admittedly limited to a small

audience, nevertheless has created

comfortable with. Even having articles

pressures Ned isn't completely

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Ned with his trademark hard shell helmet during the Iron Horse road race



has been ever since he started bike racing. He doesn't proselytize about it at all. It's just his own choice. He won't drive his car three blocks without buckling up his seat belt either.

In a way, he sounds too good to be true, sort a Boy Scout on wheels or maybe the classic western hero who, after single handedly saving the maiden in distress from marauding indians, just stands there shiyly kicking the ground and mumbling "Ah, shucks, ma'm, twern't nothing anybody else wouldn't a dun". That may be part of his personality but if it is, it plays at best only a brief walk on role. No, Ned definitely appreciates acknowledgement for what he's done.

That he hasn't received the recognition he deserved for his convincing win during last year's Crested Butte Fat Tire Bike Week Stage Race, a race he completely dominated by winning every stage, still rankles a bit. Or for his winning last year's Winning Magazine Prestige Cup. Or for any other victories over Joe Murray last year, victories he's the first to admit came far less frequently than his placing behind Joe. It's not that he wants to detract from anyone else's glory; he'd just like what's due him also. That's probably why he wanted the Nationals so badly last year. He knew that a win at sea level in California against the strongest mountain

biking field yet assembled would have firmly established his position beyond any doubt. But a flat tire unfortunately relegated all that to the world of "what if". There's no doubt that had Ned not flatted, it would have been a hell of a race, pitting three of mountain biking's most determined, skilled, and formidable riders against each other right to the wire. Ned certainly doesn't look particularly

formidable though. He's shorter than average and slight of build, attractive but not striking. Getting lost in a crowd is a snap for him. He just kind of disappears. He's driven by an ego that demands winning performances but he's equally content being noticed or not. I suppose ultimately he's a man who simply enjoys competition, who loves the camaraderie of athletics, and who's comfortable with who he is. Talking to him. I couldn't help but think he's a throwback to the classic English athletes who competed for the salce of competing, the ultimate amateurs who valued good sportsmanship as much as winning. Ned's a class act in an age when professional athletes are becoming more infantile with every increase in pay they receive. But perhaps ultimately that's as much mountain biking's nature itself as it is Ned's and why he prefers off-road racing and living in a small city/town in southwestern Colorado.



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### The Art of Hill Climbing

### by Turner Brown

It's a skill to be mastered, not just a test of strength, and can be as sweet an experience as a wild rose's perfume.

Hills are integral to mountain biking. Consider them the equivalent to a rose's thorns if you will but you'll still have to deal with them so you might as well enjoy the experience. Besides, a good hill is something to look forward to, something to fling yourself against, to test your mettle. And with practice and perseverance, hills can provide some of mountain biking's highest moments. It's a skill to be mastered, not just a test of strength, and can be as sweet an experience as a wild rose's perfume.

Picking the smoothest line up a hill will, to a point, make up for any lack of strength. The rider who follows the path of least resistance will cruise where someone else staggers and weaves upward like a drunk on stairs. Unfortunately, spotting and then riding the best line are not necessarily one and the same.

The slower your speed, the less pronounced your wheels' gyroscopic effect and the harder it will be remaining upright. Spinning wheels resist leaning. To prove this, take a wheel and hold it by the axle ends after spinning the wheel. Lean it one way then the other. Continue doing so until the wheel has come to a stop. That's what I mean. Spinning wheels resist eaning; they want to maintain their plane. The faster they spin, the greater the resistance to learning. Rapidly spinning wheels help keep bikes upright. Not slowly moving wheels, they'll flop over on a dime.

The slower your speed, the less stable you'll be on the bike. So you start working the handlebars back and forth to keep your balance. And every time you do, you change course and blow the line you'd carefully picked out. You can see it in your peripheral vision off to the left while you helplessly clatter to the right, bouncing over the rocks you wanted to miss. Following your line, any line in fact, is no longer a concern. All you can do is hold on, keep pedalling, and hope you make it

Or perhaps you picked out the smoothest line and even stayed on it. But just as you start thinking you've got the hill made, you do a wheelie. You manage to plant the wheel back on the ground only you're now off line and unable to swing back onto it. You stand up to salvage the situation and the rear wheel spins out and you're dead in the water.

Or you pedal up a smooth, steep single-track. Traction is excellent and the bordering grass is clear of any pedal snatching traps. It's a cakewalk. Until you come to a six-inch diameter log. You lift the front wheel over without pulling a wheele then try to power the rear wheel

over. Only the log's damp and the bank rotting and your fire spins uselessly. You unceremoniously depart from the bike in the middle of a hill too steep to get going

The scenarios are as varied as the land we pedal over. But no matter what the environment, hill climbing is still just a skill to be learned.

Successful assents start at the bottom. Attack in the gear you think you can ride up in. Down-shifting in the middle of a hill can be difficult, even impossible. If the terrain is smooth, hit the hill as fast as you can then quickly down-shift as you slow. Forget trying to maintain any kind of pedal cadence if the hill's steep. Just throw the lever all the way into the lowest gear the moment you slow appreciably. If the trail's rocky, a fast entry will probably bounce the bike around so much you'll loose your line and won't be able to down shift because you're too busy hanging on. Rough terrain/slow entry and smooth terrain/fast entry is a pretty good

If you're an in-the-saddle climber. traction won't be a problem since most of your weight is already on the rear wheel. What can happen instead is the front wheel will lift into the air. The steeper the hill, the more likely this is. To keep it on the ground, slip forward on the saddle and bend low in the waist. Drop your elbows and press the bars down. Don't pull up. Don't worry about spinning the rear wheel. You won't unless your legs are exceptionally strong or the ground surface very loose. If either of those are the case, moderate your effort. Pedal smoothly and maintain a high cadence.

Out-of-the-saddle is generally a more powerful climbing method but can result in a spinning rear wheel, especially on bikes with long chain stays. Short stays are usually superior for standing though there are exceptions. (The front center/rear center ratio has as much influence on climbing ability as chain stay length.)

The trick to climbing out-of the saddle is a low crouch over the top tube. Crouching lowers the rider's center of gravity while enabling subtle weight changes to be made between front and rear wheels. How low you crouch is dependent upon the grade. Moderate hills need little crouch, steep hills more.

Many riders lower their seat for climbs over rough terrain, a common practice for downhills. (The Breeze & Angell Hite Rite solves the problem of always having to stop to raise or lower your seat.) That gets it out of the way for maximum freedom in maneuvering. Others prefer the saddle at its normal height and use the tip as a balance point.

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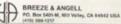


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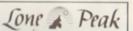
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What's really happening with all these body movements, sitting or standing, is you're adjusting your center of mass relative to the bottom bracket. A person's center of mass, located approximately behind the belly button, is the equivalent to a ball's center point. Imagine a string tied to that point with a weighted arrow attached to the other end. When you're on a bike, the closer the arrow hangs to the bottom bracket, the more weight there'll be on the pedals and therefore on the rear wheel. The closer it is to the handlebars. the more weight there'll be on the front wheel. If you move it too close to the handlebars, the rear wheel may spin; too far back and the front wheel may lift up.

Standing is particularly effective on rocky passages because it allows maximum body english when negotiating obstacles. The key is not being in too low a gear. You want some crank resistance to work against to help your balance. Too low a gear can also cause rear wheel spin dae to excessive torque plus a higher gear propels the blike further per stroke, important when the chance of banging a pedal is high. A half stroke in a higher gear can create enough momentum to get the bike over an obstacle where in a lower gear you might come to a half against it for

Like Scotch or red wine, hill climbing is an aquired taste but once you've got it, you're hooked. lack of momentum. Or else you smack the rocks when you attempt to continue pedalling.

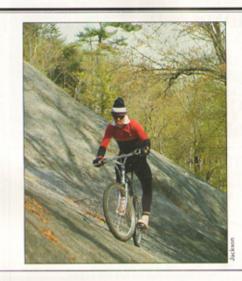
The final ingredient in becoming a proficient off-road climber is attitude. There we been times when I've flown up steep passages that at other times I barely even got started up before jumping off. The only difference was my head space. If Ilook at the hill and inwardly groan, I'll never get up. If I eagerly attack the hill, I may not get to the top but it won't be for lack of effort. You've got to enthusiastically leap into the fray and treat the hill as an exhilarating challenge, something to exercise your niding skills on, something to have fun on have fun on

There's no reason not to. Speeds are so slow that the chances of an injury are minimal. If you have to ball out, you'll probably be almost stopped. Just step off the bike then walk up. You don't have to worry about braking or shifting, just maneuvering the bike and powering it forward. You can throw caution to the winds and attack without a care in the world. If you get up, you'll be jumping for you, If you don't, you'll still feel great just because you were pushing your limits. Before long, you'll find yourself looking forward to hills for the sheer joy of it. Like

scotch or red wine, hill climbing is an acquired taste but once you've got it, you're hooked.

The skills you develop on hills will carry over into all of your biking. Rough passages, regardless the grade, will no longer loom like Milo's closet of anxieties. They'll be eagerly grasped challenges. As your skills continue to be honed and the level of difficulty you can successfully ride over increases, the terrain available for your pleasure will increase exponentially. It's analogous to rock climbing or skiing: the greater your expertise, the more places you can play and the fuller your exhibitation will be.

The beauty off all this is that no estraordinary strength is required. Physical conditioning, yes, but not brute power. Technical skill is not symonymous with strength. It's using your equipment and your body as efficiently as possible. We're not talking Rambo here, we're talking Baryshnikov. Mountain biking is a sport where grace and smoothness are the objective, not seam splitting, sweat dripping labor. Mountain biking is a dance, a rhythm sliently flowing over the land, an experience that makes us laugh. But it's also something that needs to be learned, that needs to be practiced.



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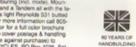
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### The Secret Valley: An Urban Wilderness



### Story and photos by Frank Staub

The last old-growth in my neighborhood went under the buildozer more than a quarter century ago. I was ten at the time and for me and most of my friends it was a terrible loss. All of our favorite places were in that four-block square wood lot. When it was gone, so were the best climbing trees, our "secret forts", and a modest system of dirt trails where we could ride our fat tire onespeeds in safety, away from the heavy suburban traffic.

It was then that I first wanted to see the great undeveloped landscapes west of the Mississippi. I now live near one such trea in the heart of the Rocky Mountains. But I do get back east now and then to visit my folks. They still live in the same house where I was raised and my mother still asks "When will you grow up? Adults don't ride bicycles." Although I've put away most of my childhood pastimes, riding a bicycle through the woods isn't one of them.

So last winter, during my annual holiday visit, I decided to see if there were any mature deciduous forests left in the greater metropolitan area round my parents home appropriate for "backcountry" bicycling. I hoped to find a place with the same characteristics as my beloved childhood wood lot - tall, majestic trees mixed with a healthy growth of shrubs and herbs. This was the kind of scenery that once covered most of eastern North America, making it one of those environments that wilderness buffs like myself consider sacred. Locating undeveloped land in urban areas isn't difficult but it does require some research.

There are places to ride around here

but you have to look for them" says Ric Kriebel, owner of a bike shop specializing

The easiest way to find an urban wilderness is with the aid of a good city. map available at gas stations and newsstands, one that shows the entire metropolitan area, not just the inner city. On these maps, the parklands stand out amid the sea of streets like inviting emerald islands.

I assumed the most venerable forests would be in the outlying suburbs. But the woodlands I checked out in these locations were still young. Enough time hadn't yet passed for these old farms and abandoned lots to produce the large trees I was looking for. Apparently they were still recovering from the city's rapid expansion into what was once "the country"

Eventually I did find the kind of forest I was looking for but it was well within the city limits. For reasons that will be explained later. I'll refer to it simply as "The Valley." It was a publicly-owned park, six miles long and less than a mile wide. A complex system of hiking trails and bridal paths ran its entire length. Most of The Valley was shaded by a towering canopuof high branches supported by massive hardwood trunks like those that impressed the Pilgrims. An undergrowth of small trees beneath the canopy was a miniature forest in its own right and contained every possible shape a tree could have. The Valley was probably as close as you could get to a jungle in this part of the country.

And can you believe its only fifteen minutes by bike from City Hall", said Ted,

WRITE FOR BROOKING



a bicycle mechanic and one of the few mountain bikers I met in The Valley. He and several others got together every Wednesday and Sunday for some serious trail riding. I was delighted when they asked me to join their group during my brief visit.

"Have you ever seen cycling trails better than these?" asked Rob, a senior medical student from California

I had to admit that I hadn't. The terrain was what you'd expect in the eastern U.S.: plenty of level sections mixed with short ups and downs for an ideal combination of thrills and aerobics. Chunks of schist and gneiss along the trails held the soil together while providing plenty of technical challenges. The bridle paths were wide enough for those who like to have some extra room in case they miss the best line. For over a hundred years, horse hooves and hikers boots had packed these routes firm and hard.

"There's something here for everyone." said Curtis, owner of an antique bicycle shop. "Even a beginner can handle it."

During my twice weekly rides in The Valley, I was introduced to some typically urban experiences which required a bit of mental readjustment on my part after spending so much time in the remote

National Forests of the west. For example, a former BMX'er in our group thought that a truck hood discarded in the woods would make a perfect jump across a drainage ditch. Fortunately, his plan never materialized.

One end of The Valley was bordered by a golf course we had to ride around when connecting between two foot trails. That was practically the only time in my life I'd ever had contact with a golf course. During one of our rides, an alert caretaker noted my intention to shortcut across one of the greens. In a loud, assertive voice he quickly informed me of my ignorance about the fracility of these surfaces - just in

Every now and then we'd ride beneath high bridges which joined the city on either side of The Valley. The surreal sight of these giorntic structures above the trees always gave me pause. But they had little effect on my illusion of wilderness. After all, I was riding through a classic oldgrowth forest in the middle of a major city. In such a context, how could a few bridges matter.

My tolerance for the signs of civilization in the woods was really put to the test when I first saw a huge concrete statue of an Indian kneeling at the top of a

small cliff. There were no benches, no trash barrels, no asphalt paths. Nothing surrounded him but primeval forest. He looked out onto a scene that probably varied little from what a real Indian might have seen during the eighteenth century. The view over the treetops from the Indian statue made it one of our favorite resting

Backcountry is where you find it and how you define it. The Valley certainly couldn't qualify for status as a federal Wilderness Area. But its forest was no less enchanting than that of northern Maine or the Smoky Mountains. Sometimes I'd hear a siren or a barking dog but the surrounding buildings were almost never visible and the air seemed clean. Often, I'd forget where I was - like the time I heard the muted sound of a whitewater river filtering through the trees. Then the unmistakable growl of an eighteen wheeler brought me back to reality. What I had unconsciously taken for distant rapids was actually the drone of expressway traffic

There was something else I experienced more of in The Valley than in the western wilds, and it caused me some concern. Prime natural areas in big cities can draw people like rice in a refugee camp. Although The Valley's trails weren't really crowded (it was December) there were enough horses and hikers to persuade me into a greater than usual caution. No problem there - just conventional trail etiquette. What really troubled me was how many mountain bikers The Valley could or could not accommodate in the future. The subject came up more than once during our breaks at the statue.

Millions of people lived within a ten mile radius. How long would it be until a fair portion of that population realized that a bike trip through the woods is a quick and easy back-to-nature supplement to aerobics or racketball. How long would it take for hundreds or even thousands of local residents to discover that silently floating between the trees, propelled by the bare minimum of machinery, can generate the same sensation as fast graceful flight. And with increasing numbers of mountain bikers in The Valley, how much time would pass until a hiking club over-reacted to the inevitable "incident" and pushed for a ban on bikes from some of the best and most accessible cycling trails in the region. The thought left me with an empty, helpless feeling.

I don't have the answer to prevent such a scenario but perhaps this article will stimulate some discussion towards that end. The time has come for us to start policing ourselves before we continue to be policed by those with no understanding of our sport. But until that happens, you'll have to excuse my refusal to reveal The Valley's location. Call me selfish and I can't argue with you. But I don't want to risk losing yet another forest where I can still bike.



Limited Edition: Fracer than 1,000 will be built this year.

### The Shorter, Steeper, Quicker. **Bridgestone MB-1**

### A Mountain Bike for Malcontents

#### The Trouble with Most Mountain Bikes is...

They ride like farm equipment. Stable, but slow. Comfortable, but slow. You can ride them over almost anythingslowly.

#### The MB-1 is Different

It was designed by riders with a road racing backround. Riders who wanted a begisable bike, but would not sacrifice control and agility to get it. We are those riders. And we did succeed. Here's how.

#### **Shorter Chainstays**

Of course our radically short 16.9" chainstays give the MB-1 unmatched traction on loose dirt climbs. But we built them short so the bike would accelerate like our road bikes. It works.

#### Steeper Seat Tube Angle

We believe that the sole function of the seat tube angle is to position the rider over the cranks. (Leave shock absorption to fat tires and good technique!) We designed a 73° seat tube angle for more efficient seated sprinting and faster transitions from sitting to standing, just like on a road bike.

#### Steeper Head Tube Angle

Our 71° head tube angle has what we feel is the optimum balance between straightline stability, and cat-like response. Our bike outsteers traditional designs at any speed. Some bikes, it seems, were designed to stay upright while hitting every obstacle in sight; the MB-1 was designed to stry upright while missing them. Try it on one ride. and you'll never go slack again.

#### Narrower Handlebars

We've choosed the bars down to a sensible 23", so you won't have to. This width significantly improves steering at any speed, and keeps out of the way of poison oak branches, parked cars, tree trunks and the occasional other rider.

#### Stubby but Powerful Brake Levers

Whether braking in desperation through a layer of mud, or feathering the rims for precise control in a high speed turn. Dia Compe Tech-5 levers are our favorites. We've never known anyone to go back to oversized levers once they've tried these. Small is beautiful.

#### Light and Mighty Wheels

Araya's boulder-proof super hard anodized RM-20 rims. Suntour Cyclone Sealed quick-release hubs. Ritchey's light and fullyprotective 1.9 Quad tire. Take these wheels to any bash. With presta tubes, of course.

#### The Smoothest, Lightest Pedals

We had to have Suntour XC Compes. They're light, silky smooth, grip shoes like the dickens, and accommodate toe clips with ease. Naturally, we supply the toe clips. (These pedals are twice as costly as the pedals most commonly found on mountain bikes which sell for hundreds of dollars

#### A Bridgestone Exclusive

The MB-1 accommodates 700c wheels, short reach sidepulls, and dropped handlebars. So you can turn it into a bulletproof bike for fire roads, a super stout tourer, or a slightly heavy criterium bike!

#### **Test Ride It**

Visit your Bridgestone Dealer and test ride the MB-1. Feel the difference. If this is the mountain bike for you, you'll know before you get out of the parking lot.



Bridgestone Cycle (U.S.A.), Inc.

### Choosing a bike

Summer: hot days reverberating with the sound of buzzing lawn mowers, birds singing, and kids careening around in jumbled pursuit of one another. You wake up in the morning with a sparkle in your eye, a spring in your step, and an eagerness to get on with life. Today that means picking out new bikes, something a little lighter, a little faster than what you and your wife have been riding for the past two years. Not that there's anything wrong with the old bikes. They still ride fine; you've kept them up regularly and all the components work and the wheels are true. You're going to give your wife's to your son. It'll be a fine replacement for his BMX, a good bike to introduce him to the joys of off-road cycling.

But they're no longer enough for you. Mountain bikes have evolved dramatically since you bought them. Today you can buy a better bike for less money than you paid two years ago. But the truth is that's not why you're so eagerly heading off to the bike shops. You're going because you deserve it. Both of you have worked hard at improving your riding skills, you're in good shape, leaner and stronger than you've been in years, and you're no longer just riding around town, usually down to the market. Mountain biking struck some cord within your psyches and you're hooked. It's not just another form of recreation; it's a sport and a life style you've thrown yourselves into. You've been training, riding every day, and you're ready to exploit that rediscovered enthusiasm, to exercise muscles you'd forgotten about. You feel like kids again and that feels good.

If the lawn and house are showing a few signs of neglect because of your rejuvenation, that's okay. You were spending too much time on them anyway. It's summer, time to loosen up and relax, soak up the heat, and stretch muscles aching for release. No longer are weekends filled with the drudgery of chores. Friday afternoons now find you gleefully piling into the car and heading into the country for a weekend of off-roading. At last there's a sport you can do together, doesn't cost a fortune, and is jammed to overflowing with adventure. Every weekend is a camping trip to somewhere new, somewhere out in the woods or up in the mountains, somewhere where people are in short supply and there's a wealth of silence and nature.

When you stop and think about how your lives have changed because of these crazy looking fat tired bikes, you shake your head in wonder. You haven't felt this fit since college. And your son and you are getting along great, thoroughly enjoying sharing a common sport and each other's company.

So today's the day you buy new bikes and you're psyched. But how will you know which ones to buy? You're planning on spending more money on bikes than you'd ever dreamed of before and you want to be sure you get the "right" ones. With all the models on the market and all the different designs, that won't be

Our advice is keep it simple. Don't worry about components, at least not at first. You're not buying the components; you're buying the bike they're hung on. And don't walk in with fixed ideas on what a bike's geometry should be. Test every top-of-the-line model you can. That doesn't mean spinning around the shopping mall parking lot either. Mountain bikes are designed for off-road use; test them off-road. Test the highest performance models available regardless of what you intend to do with them. Don't be afraid of the price tag. Ride them all until you find one that makes you laugh, that just feels right. Now worry about the price.

Decide what your budget is, test bikes in that price range, then buy the one that comes closest to the performance of the

expensive model that turned you on. Don't pinch those coins too tight. If another fifty or hundred bucks can be dropped and that's how much more the bike you really like costs, buy it. You'll never regret it. Once the money's spent, it's history. But the experience of riding that bike will stay with you as long as you own and maintain it. You don't have to buy the most expensive bike around. Not at all. Just don't compromise your potential pleasure by severly restricting your choice of bikes. Set a budget but cut yourself some slack

### Our advice is to keep it simple. Test every top of the line bike vou can.

When testing a bike, you'll not get a true impression if it doesn't fit you. Many are equipped with high rise bars that provide an upright riding position. Switching to flat bars can dramatically change a bike's feel. Or visa versa. Slide the saddle forward or back, up or down as needed. Then ride it over rough terrain, the rougher the better. Extreme conditions bring out a bike's handling

After you've found a couple of models you like, compare the components and general workmanship against their prices. If one bike's ride stands out but some of the components aren't what you want, ask the bike shop to make some changes. Crank arm length is a perfect example. Specify a crank length appropriate for you. Generally that means one shorter than you might use on the pavement. The taller you are, the more you'll have to compromise between optimum crank length relative to your legs and ground clearance. If you expect to ride rough, rocky terrain, opt for the shorter length.

Any shop should willingly make those changes for you. Doing so may add a few dollars to the price but will be worth it. Besides, it's when buying the bike that you have maximum bargaining power. Just remember that a bike shop's profit margin is tight and you're better off foregoing a small savings in favor of establishing a long term relationship with the shop.

Make sure the bike's been properly put together, greased and adjusted, and arrange for a free check up in a week or a month, depending on how much you ride it. Then buy the bike.

Don't take it home and park it. Immediately head out for a long ride. Spend all day on it.. Push it and yourself to the limit. Explore its performance in every condition you can find. That's why you bought it, to ride, not to lean around the house and admire. Just remember that such a course of action can only have one result: more changes in your recreational lifestyle until one day you wake up and find your work being structured around recreation. When that happens, you're doomed, doomed to a life of adventure.

What kind of bike you buy depends upon what you went it for. If your dream is long distance touring, mountain bikes are unbeatable. You won't be setting any speed records loaded down with panniers no matter what bike you ride so don't worry about the fat tires. They provide a softer, more comfortable ride than skinny tires, won't limit you to paved roads, and will practically eliminate flats. Be sure to get a bike with braze-ons for racks and fenders and at least two water bottle cages. You'll probably prefer a model with a slightly longer wheelbase and a slightly more relaxed seat tube angle than a racing bike's. Pedals with toe clips and straps are strongly recommended. For straight road touring, Specialized Nimbus tires or possibly Avocet's fat slicks will do nicely. The Ritchey Quad is currently the best of the dual purposed tires for road and dirt.

If you've a bit of the Walter Mitty in you and want to try your legs at racing, seek out something with a competitive nature. You'll probably want low, flat bars, light weight wheels (with quick

### Bikes

cleases, also true for touring), aggressive knobbies (like the pecialized Ground Controls, Fisher Fattrax, or Ritchey Force), pedals with full toe clips and straps (the Suntour XC Comps are currently the most popular), and a short wheelbase with short chain stays, something along the lines of a 43-inch or shorter wheelbase with 17.5 inch or shorter stays. A steeper seat tube angle is often preferred (71 to 73 degrees is a common range) while head angles range from 69 to 71 degrees. For general sport riding, you'll probably want something akin to a racing bike.

Unless you're absolutely convinced you'll never ride off-road. don't get a city bike. There's nothing wrong with these fat tired cousins; they're fine bikes in fact. But they're not meant for offroad. And once you try the dirt, you may end up hooked and the city bile won't fill the bill.

Be sure to get a comfortable saddle. This is the one area where manufacturers save a few bucks and shops make a few bucks. There's nothing worse than a cheap saddle. It'll ruin any day and any bike. Pop for the extra bucks and get a good one. You'll never regret it. A cheap one will haunt you like a nagging spouse.

You're not finished yet. There's more to all this than just the bike. Riding without a tool kit is like walking into a restaurant with shoes and shirt but no pants. You'll need at the minimum a chain tool, piers, tube patching kit, and a couple of allen wrenches. Your dealer can set you with what you'll need for your bike. Don't forget a pump. And some kind of chain lubricant. And at a bare minimum, have one water bottle cage and one large

water bottle. Two is better. Then there's the clothing. But we won't go into that right now, Suffice it to say that all those mountain bilivers wearing fast looking cycling clothes are doing so for good reason. It's simply more comfortable than cut-off jeans. But the cut-offs will work so go

ahead and wear what you've got. For now. Down the road, you'll no doubt discover for yourself that cycling shorts really are better.



Thinking of the US as the source of all mountain bikes and the Far East as simply where they're manufactured is an easily understood mistake. After all, the impetus for this crazy sport developed here and the vast majority of custom frame builders are American as are many of the major manufacturers despite their bikes' overseas origin. And for quite awhile, we were the world's only fools foolish enough to voluntarily scrabble around in the dirt on these fat tired flying carpets. But once again Americans' penchant for off-beat sports has shown no respect for borders. date lines, Curtains, or even The Great Wall of China. Even the hallowed ground of Tibet, only recently opened to Western soles, has felt the soft tread of fat tires. Mountain biking has gone international

Based on reports we've heard, British Columbia and the Vancouver area may be one of the world's hottest beds of mountain biking. The riding potential is reportedly without end, the scenary spectacular, and the people fairly bursting with enthusiasm for hikeling (as they sometimes call it).

With that kind of base to draw on, it's only natural that Canadian frame builders would surface. The Rocky Mountain Team Thunderbolt test bike is one product from one Canadian shop. If it's indicative of Canadian capabilities, American frame builders might well start looking north for some fine competition. The American dollar's strength relative to the Canadian dollar can give bikes built by our northern brothers a distinct price advantage



Our excercise physiology advisor Teresa Bradford heading out on the Rocky Mountain Team Thunderbolt

The Team Thunderbolt immediately stands out because of its dramatically sloping top tube. We've ridden three other bikes with sloping top tubes (Klein, Cannondale, and Moots) but none were as angled as the Rocky Mountain's. The sloping tube provides ample crotch clearance, which why they're generally found on trials bikes. Their only drawback for mountain bikes, and on the Team Thunderbolt it's more extreme than on others, is the lack of space for inserting your shoulder to carry the bike. There's barely room without a water bottle cage. With one, forget it. The degree to which this constitutes a drawback depends on how much you carry your bike. That's probably minimal since most riders prefer pushing their bikes.

A sloping top tube also reduces the bike's weight because of its shorter length relative to a horizontal tube. Some builders also claim it stiffens the frame. But the most useful advantage for most riders is probably the clearance. If you've ever slipped off a pedal during a rough passage, this is one feature you'll immediately appreciate.

The fillet brazed frame consists of Columbus SP tubing. And as usual, we noticed a certain liveliness to it that seems to be inherent to the tubing. Describing exactly what that is isn't easy; the best we can do is say it has a sense of springiness. It doesn't necessarily

improve the bike's performance more than if it had been built out of Prestige or some other equivalent tubing. It's just different

The best word to describe the the Team Thunderbolt is sporty. The moderately short, 45-inch wheelbase combined with 17.25-inch chainstays assure that. Reinforcing that impression are the unusually narrow handlebars, designed and made by Rocky Mountain Cycles. One of our biggest gripes with production bikes has always been their excessively wide handlebars. Almost without exception, we have to cut them down by two inches or more. Not the Team Thunderbolt. These were the narrowest bars we've seen yet and we loved them. Everything about them felt right: the reach, height, bend, and width suited us fine. Now if only everyone would cut their handlebars down to at least no more than 24-inches tip to tip, especially those high rise rigs that look like they were stolen off a Texas longhorn.

The bike nipped around with minimal effort and climbed like a demon, in-the-saddle or out. There's nothing particularly different about the design; it's all pretty standard with 69 degree head and 73-degree seat tubes. Slow speed manusevering was good, quick enough for most riders without demanding constant rider another in the seat tube made for easy stitting standing transitions while placing the rider in an excellent position relative to the cranker.

No one could ever put there fingers on exactly what it was about the bike that was so much fun. It might have been the sloping top tube. The bike just seemed so small and light that riders tended to fing it about in a rather relaxed manner as if it was more of a toy, which it obviously wasn't. The moment we hammered on it, the bike immediately responded. There was no question about the performance level; the bike could fly.

Components were as would be expected on a bike this expensive. Shirnano 600 hubs with quick releases, 600 readeralleur, Deore XT front derailleur, Magura braike levers, Specialized cranks, Saturne X-28 rims, and Shimano Deore shifters. The one thing we didn't like were the 1.75 RIC X-1 Racer tires. They're too narrow for most off-road use except on hard and relatively smooth surfaces. Fatter versions of the same tire are much preferred. The bike is also equipped with Suntour XC Comp pedals with straps and toe clips, whenever they're available. Evidently there's a shortage of these fine pedals.

#### Ritchey Aspen

This is Tom Ricchey's least expensive bike, about \$800. How does be get the price down? By having it built in Japan. "Hey, but if it's a Japanese bike, why buy one of those instead of a some other Japanese bike? I mean, if it's not a Ritchey, why pay for a Ritchey?" Because it is a Ritchey.

The Aspen may be built in Japan but it's built to his specifications. And because his name is on it, you can be sure he closely watches the quality of workmanship.

Except for the tubing, the Aspen is basically a Team Comp. The geometry is exactly the same as its more famous leader and identical to the hand built Timberwolf. In fact, the tubing is the same as the Timberwolf's but instead of being fillet brazed, it's tig welded. Head angle is 69 degrees, seat tube 73 degrees, wherehouse 43 inches with 17.75-inch chamatays. The bike's handling characteristics are the same as the Team Comp's. The only difference is in the feel of the Comp's Columbus tubing versus the Aspen's double-butted chrome-moly tubing. The Columbus is lighter and has a certain livelines that's hard to describe. But really, the differences are subtle. It's not as if the average rider

could get on the two bikes and tell them apart without looking at the decals.

So what the Aspen has to offer for some \$500 less than the Team Comp is a bike that's preciscally a Team Comp but with less expensive components. Instead of Shimano Dura-ace, the Aspen uses Deore XT components. Instead of Ritchey Kevlar Force tres, the Aspen soorts Ritchey Quads. Instead of Suntour XC Comp pedals with clips and straps, the Aspen has regular Suniour XC's. And so on. So the Aspen certainly isn't cutting any conners. If a all top-of-the-line stuff that any bike would be proud to wear. One particularly appreciated touch the Aspen had were quick release hubs. We wish more bikes came so equipped



#### Ritchey Team Comp

The Team Comp is an attention grabber. Whether because of the bright red paint job with contrasting yellow lettering or just seeing Tom Ritchey's name on it we never knew. The bike just drew admiring glances wherever it was ridden.

This is the Ritchey line's top bike, hand brazed by Tom himself. His name is one of the most recognized names in mountain blining and anyone who has ever spoken to him about blocyle design or heard him speak on the subject knows full well his conservative bent. Throughout the the current trend to steeper and shorter bikes. Tom has adamantly refused to join and in fact, has argued strongly against it. He steadfastly claims his geometry is quick enough for anyone and any condition, is superbly stable at any speed, and will handle unexpected obstacles with an aplomb missing from more radically angled bikes. Judging by the number of Ritchey blies sold, he's obviously not alone in that belief.

Without fail, every one who hopped on the bike immediately commented on its steering. It was variously described as heavy, sluggish, and with a strong wheel flopping tendency. But by the time they returned from an extended ride on the Team Comp, that changed.

Describing the steering isn't easy. The front end seems to resist turning forces as if there's a distinct need to overcome the wheel's inertia. The sensation is somewhat similar to the difference between driving a high performance car with power assisted steering versus one without any power assist. At slow speeds, the steering was heavy; at faster speeds, it fightened considerably.

The bike was as quick as anyone needed. In fact, it encouraged

### Bikes

hard, aggressive riding. It wasn't unusual for riders to find themselves flinging the bike into situations where normally a certain amount of caution tempered gung-ho emotions. The head angle provided plenty of stability for sure-footed tracking over rough terrain yet never interfered with obstacle dodging. The only time the steering really seemed a todal sluggish was on slow, steep climbs and on tight single-tracks. Still, no one could say it forced them off a line. There was simply a sense of resistance that was quickly accepted and forgotten.

The geometry is pretty conservative by today's standards: 69degree head angle, 73-degree seat tube, 17.375-inch chain stays, and 43.125-inch wheelbase. But don't go by the numbers. The bike doesn't ride conservatively and there's no doubting its race huritane.

The weight isn't exceptionally light, just under 28 pounds, but riding it is a different story. The bike has a light, lively feed to it that seems to crave aggressive riding. We can only attribute that to the Columbus tubing since there's nothing else dramatically different about it. It's not the first time we've heard such comments about Columbus tubing.

Part of the test was on the Moab Stickrock Trail with Avocet fat slicks mounted on the Araya RM 20 rims. The bike and the tires shone. Riders were soon hammering over the rock, attacking hills with total abandon, coming out of the saddle and just pounding up. The slicks grip was uncanny but there was something about the blke itself that generated confidence. There's one hill in particular on the trail that stops many a rider and many a bike. But the Ritchey with those slicks and a 28-tooth granny ring flew up and over the top, making it look easy. So easy that people had to drop back down and try it again just to make sure. Those short stays, excellent weight distribution, and the sticky tires let everyone stand up and hammer the pedals with no concerns about slipping. We also found ourselves putting in quite a sew road miles on the bike with those Slicks. With some drops and road gearing, no one doubted the Team Comp would keep right up with road bikes.

Components are about what you'd expect on this caliber a bise; mostly Shimsno with Dura Ace front hub, Dura Ace six-speed freshub, quick releases, 600 cranks and chain rings (not Biopace), 600 head set, Deore front derailleur, 600 rear derailleur, Deore shifters, and Deore cantilever brakes. The brakes were the only surprise considering that Suntour's roller cam brakes are

practically de rigeur on any performance bike. But the cantilevers are lighter, easier to adjust and maintain, easier to open for wheel removal, and, in the opinion of many, provide equal braking power Brake levers are Magura, the saddle by Avocet, and the seatpost Suntour XC. All top of the line stuff. The tires are Ritchey's new 600 gram (claimed weight) racing tire.

The frame set is immaculately built out of Columbus off road tubing, fillet brazed by Tom. The unicrown fork is also fillet brazed at Tom's shop. And that's why people buy Ritchie's. The man is renowned for superbly crafted frames and the Team Comp exemplifies his skill. You'll have to see one for yourself to understand. It's why the bike never failed to attract long looks every time we took it out. Whether justified or not, Ritchey bikes are still the measure for many a rider. And of all his frames, the Team Como is the most coveted.

#### Schwinn Sierra

The Sierra typifies the quality mountain bike that can be bought for a surprisingly low price, in this case about \$325. (Because of the reising value of the Yen, prices are approximate. It's quite possible you'll find a Sierra for less if you find a dealer who bought before price increases went into effect.) Though the vast majority of Sierras are reportedly ridden only on streets, it's still a bona fide mountain bike and as such, has to be built accordingly. That means strong construction to withstand the extra abuse off-road riding generates.

What you'll get for your money is a frame with 4130 chromemyd double butted main tubes, 4130 chrome-moly stays, forged dropouts, and a 4130 chrome-moly Unicrown fork with oversized fork blades. The geometry is conservatively modern: 70-degree parallel angles, 18-inch chain stays, 43-inch wheelbase. But Schwinn didn'i stop just with that. You also get water bottle bracket braze-ons plus front and rear rack braze-ons.

If all this doesn't impress you, you haven't been around mountain biking for very long. Three years ago, you might easily









From Ritchey: on the left, the Aspen; on the right, the Team Comp

have paid twice as much for a bike built out of straight-guage tubing and without as excellent a fork as today's Unicrown design. Certainly that isn't meant to make the Sierra to be anything other than what it is - a \$300-plus bike - but nevertheless, it's an impressive bike for the price. Heck, we know of people who bought rebuilt old Schwimn clusikers fixed up with drum brakes and a five-speed freewheel for over \$500. We know of others who paid almost \$600 dollars for used Schwinn Varsity frames modified into mountain bikes. Everyone of those folk would have loved to have been able to pick up a Sierra for almost half what they paid for bikes that were heavier and not nearly as well constructed or set up.

Like computers, mountain bikes have been rapidly dropping in price while their qualities have been going up. But '86 looks like the year those plunging prices uniformly start increasing. We really can't imagine being able to buy a bike of the Sierra's quality for less than what they're currently going for. On the contrary, we wouldn't be surprised if the same bike is going for quite a bit more in '87 so this summer may well be the time to buy that mountain bike you've been dreaming of.

In mountain bikes as in every thing else, you get what you pay for. So don't expect top of the line components on the Sierra. That's not what you're paying for. There's nothing wrong with the Sierra's components. In fact, they do everything the fancier versions do and quite adequately. They're just less expensively made. Derailleurs, shifters, 5-speed freewheel, and cantilever brakes and levers are all by Shirmano. The only one of the group that we questioned were the shifters. They look a bit fragile and exposed to breaking in a crash but in checking wth Schwin dealers, though they agreed they appeared a tad weak to them too,

The Schwinn Sierra on the left and the High Sierra on the right



they've actually had no problems.

Triple chain rings, sealed mechanism hubs, Araya alloy rims, pedals with chrome-moly axles, and chrome-moly stem and handlebars round out the package. The two areas where manufacturers always cut costs on low priced bixes are the saddle and tires. Schwinn is no exception. The saddle isn't bad but it may not be what you'll want if you plan on doing lots of riding. Plus, the seat post is entirely too short. It's more what we'd expect on a road bike. The tires modified street tread reflect the bixe's normal usage. You'll need to change them for off-road use.

Once you're on the bike, you'll quickly forget the bike's price. The performance is excellent with balanced weight distribution and quick handling. Every one agreed the 70-degree head angle is an excellent compromise between rimble handling, slows speed climbing, downhill agility, and snappy handling on pavement. About the only change anyone would have liked to see is shorter chain stays for better traction on hills. The basic design is well thought out and was obviously borrowed from the Cimarron's, Schwinn's current top of-the-line model. But what kept throwing everyone off were the slight modifications that made the bike more of a street machine: the high rise bars, the too short seat post, and especially the street trees.

But with a few judicious changes, the Sierra can quickly turn into an aggressive off-roader. It's all there; it just needs to be exposed. The only problem is that every time you make a change, you'll add to the bike's basic price. And if you're going to do that, you might be better off looking at the Sierra's big brother, the High Sierra. But it is too bad the Sierra is ocitified. Considering the fact that's where almost all of them are ridden certainly justifies the changes but really, this is a fine mountain bike if only set up accordingly.

Schwinn High Sierra

This is the bike that Schwinn's top mountain bike racer, Ned Overend, first competed on before Schwinn had ever even heard of him. He won with it in what was basically its stock form. In fact, the only really major changes he made to the High Sierra were replacing the riser bars with short, flat bars, switching saddles and seatposts, and putting on better pedals with clips and straps. The High Sierra's basic geometry is unchanged from what he first raced on; only the materials have been upgraded. Today's High Sierra's main triangle is constructed out of 4130 chrome-moly tri-caliber tubing with 4130 chrome-moly stays and forged dropouts. A chrome-moly 4130 Unicrown fork with oversized blades completes the frame set.

Angles are 70 degrees parallel, wheelbase is 43 inches with 18-inch stays. Nothing extravagent, just a conservatively modern geometry just like the Sierra's. In fact, the bike rides exactly like the Sierra's The High Sierra's frame is probably lighter than the Sierra's but we were unable to detect any difference in ride between the two bikes. Weight distribution is excellent. The bike fairly flew through turns with only subtle body movements required to adjust the line. And again, just as with the Sierra, we all bemoaned the lack of shorter chain stays for better traction. Especially since the High Sierra was so much fun to ride.

Fisher MountainBike Mt. Tam





Bikes

Why Ned was able to race so successfully on this bike is easily understood (beyond the man's inherent athletic abilities) as soon as we headed out onto a single track. The bike darted along over twisting trails with minimal effort and seemed to encourage aggressive riding. Except that constantly off-setting the bike's nature were the too wide riser handlebars, the ubiquitous combination street/dirt tree, and a saddle no one was particularly overwhelmed by. In fact, we kept thinking what a sweet bike this would be with quick release hubs, pedals with toe clips and straps, a longer seatpost, flat bars, and aggressive dirt tires. Then someone would remind us that They, the bike only sells for about \$4201 Lighten up. Those things cost money."

They were right of course. The bike is remarkably inexpensive. It is us that it's performance engendered a desire to really hammer. Plus, from what we were told by Schwinn dealers, just like the Sierra, most High Sierras are ridden on the street. Those poor folk just don't know how much fun they're missing though there's no doubt the bike is delightful on the street too but really, the dirt is where this one belongs.

Components are impressive with Suntour XC Sport roller cambrakes and levers, Suntour XC derailleurs, Suntour shifters, a sixspeed Suntour freewheel, sealed bearing hubs, Araya 1.5 alloy rinrs, and triple chain rings. There are also braze ons for front and rear racks including a front lowrider rack plus double water bottle breckets. As already mentioned, our only main gripes were the tires and handlebars and the latter is really strictly a matter of personal preference. A lot of riders prefer the comefort of rising bars. But the tires really are seriously lacking if you plan on going olf-road; they just don't work. But every dealer we spoke to said they! I happily switch tires if that's what the customer wants. In fact, one dealer said he regularly switches handlebars and saddles for buyers also.

If a year ago, someone had said that by the summer of '86 a monotain bike could be bought for just over \$400 equipped with roller cam brakes, we'd have had to laugh. We're talking pretty high tech here and that kind of stuff just doesn't show up on \$400 bikes. But here we are in the summer of '86 and that's exactly the case. We're impressed. Especially since the entire bike reflects that evel of performance.

isher MountainBikes Mt. Tam

This is Gary Fisher's made in America flagship, a bike you can cycle across Africa, putter down to the local bakery for croissants and coffee, or, if the incination overwhelms your normal caution, ace. The Mt. Tam features a beautifully crafted, filler brazed frame wall out of quade butted Prestige tubing. Componentry is top of he-line, carefully selected from various companies. Shimano Dura Ace EX hubs with quick releases, Shimano New Dura Ace 6 speed rechub, Shimano New 600 EX crank arms with Shimano Biopace hain rings, Shimano New 600 EX crank arms with Shimano Deore XT roont brake, Suntour XC Spot roller cam rear brake with cover, suntour XC-II pedals, Shimano Deore XT front derailleur, Araya RM-20 rims with "ishar Fattrax 202 tires, etc., a Hite-Rite is even standard. You night argue with some of the selections only because you prefer norther company's product, not because of a lack of performance.

The best news is the geometry Fisher bikes sport for '86. The lead angle has been steepened from sixty-eight to sixty-nine and a alf degrees. Gone is the older bike's front wheel tendency to flop into a turn at slow speeds because of the shallow angle. (Such feelings are not unanimous though. Many a rider still prefers the older geometry. They like the stability and smoothness during downhills inherent to laid back head angles. It's just a matter of style.)

Our test riders were universal in their praise of the new head angle. They loved it, including one who's had a Fisher race bike for years and was hard core against steeper angles. The Mt. Tam lost nothing in downhils to the older Fishers but was much quicker at negotiating rough passages and single-tracks. It's hard to believe that such a small change in angle can cause that much difference in handling but it does. The new front end struck everyone as an excellent compromise between the more laid back geometries promoted for so long by Gary and the more radical, steeper designs of Mantis, Salsa, and Specialized. One indication of its compromising nature was the lack of any complaints about the Mt. Tam's steering.

The only problem we had with the bike was an overly long bullmose handlebar stem, quickly rectified by moving the saddle forward and switching to an available shorter reach bar. Finding a Fisher to fit is all but guaranteed with frame sizes' of 14.5 (with 24" wheels), 16, 18, 19, 19.75, 20.5, 21.25, 22, 23, and 24.5 inches to choose from

A seat tube angle of 71.5 degrees and chain stays measuring 17.625 inches on a 42.75-inch wheelbase (dimensions vary according to frame size) added up to an immensely likeable bike. Weight distribution was excellent. The relatively short stays made for stubborn traction in most conditions while the shorter than average wheelbase and head angle gave it plenty of agility for high speed single-tracking without compromising its descending capabilities. (Given Gary's reputation as a ferocious downhiller, it's safe to assume that Fisher bikes will always be good coming down.) The bike was completely neutral, requiring minimal body english over rough terrain. There was never any need to think about how to ride the bike. We simply pointed it where we wanted to go and it went.

A test ride over one of our favorite tracks near Moeb, Utah, a combination of graded dirt road, slickrock, loose gravel, and sand, brought out the bike's finest with the sand traps arounding the ultimate test of its balance. We'd hit sand traps at high speed fully prepared to wrestle the handlebars and make wild weight adjustments to avoid a loss of control in the dramatically different medium. But instead of thrashing around then tiptoeing through like a colt on ice, we'd drive into the softness with a subdle shift of our weight back then quickly move forward a tad and spin through with narry a wobble. After awhife, we became boider and started flying into the sand faster than we ever had before. The Mr. Tam cruised them all.

Fisher's Fattrax tires undoubtably had something to do with that. The name is appropriate. They might be the fattest tires on the market. Their size results in a very high air volume yet with a claimed weight of only 700 grams, they're surprisingly light. Aggressive traction knobs combined with small side dams lat the Ground Controls provided plenty of grip. The tires provided a wonderfully coerfortable ride with fine traction, never sliding when we didn't want them to.

The Mt. Tam comes equipped for just about anything. There are braze-ons for water bottle racks, front panmier racks, rear pannier racks, and fenders. Nothing's missing. The only thing we changed were the pedals, Suntour XC II's. The preference for Suntour XC Comp's (formerly MP 1000's) with toe clips and strap was unanimous. Especially on a bike of this quality, this much performance, and an over \$1,300 price tag.

The bike's finishing touch was a classy yellow and green paint job that made an outstanding bike stand out even more. The Mt. Tam was one bike no one was in a hurry to return.

#### Bridgestone MB-1

Here's a major bicycle company who's obviously done their homework. At a time when mountain bikes are become ever more competitively priced and ever harder to tell apart, the MB-I stands out. They've aggressively accepted the current trend of short wheelbases, short chain stays, and steeper angles and produced a race ready bike for some \$720! There's nothing missing from it either, even including wheels with quick releases and Suntour XC Comp pedals with toe clips and straps. Those items alone make this bike stand out since few of the major Japanese manufacturers currently equip mountain bikes with such niceties. But that will change. Bridgestone has raised the ante and other manufacturers will no doubt soon respond.

Categorizing the MB-1 as a race bike is somewhat misleading though understandable considering its 71-degree head tube, 73-degree is tube, 16.875-inch chain stays, and 42.125-inch wheelbase. To our knowledge, that's the most radical geometry available on a production mountain bike, similar to the very successful Specialized Team Stumpjumper but with slightly shorter chainstays and wheelbase. What makes its race label misleading are the presence of braze-ons for two water bottle cages, front rack, rear rack, and fenders. The bike is set up for long distance touring. In fact, we've already heard of a number of riders who've been eyeing the bike specifically for that purpose. They prefer steeper angled bikes with short wheelbases even for touring and the MB-1 perfectly suits their needs. Mounted up with Specialized Nimbus or Avocet Säcks, drop bars, and road gearing, this can make an exceptional touring machine, differing little from road bikes.

(There are those who claim that bikes like the MB-1 are proof that before long, mountain bikes will look just like road bikes with fat tires. While some mountain bikes may evolve into something close to road geometry, most frame builders agree that off-road needs will always dictate a distinctly different bike. A ride on the MB-1 off-road followed by a ride on a road bike over the same terrain will quickly demonstrate the mountain bike's distinctly different ride from a road bike's. If anything, don't be surprised to see road bikes evolve back towards mountain bikes instead. The road trend to ever steeper angles may well end with a gradual slackening back to softer angles. Don't foreget the MB-1's wheelbase is still about three inches longer than a road racing bike's!)

The bike was a delight to ride. It took a bit of getting used with its lightning quick steering but that didn't take long. After half an hour of riding over a single-track, the steering was second nature to everyone who rode it. It's also a bike that loves to be ridden out of the saddle. Riders who normally sit down most of the time found hemselves standing at the least reason and loving it. Those short chain stays all but insure no lack of traction on even the steepest terrain. And it the surface is muddy or loose, sitting down took care of any spinning rear wheel. The tike flat loved going up hills.

It was going down that could cause problems. You've definitely got to steer it around obstacles rather than just hanging on and bashing down over any rocks or logs that reared their grarly heads. We noticed a definite tendency of riders to descend somewhat more tenderly on the MB-1 than they might on more relaxed head-angled bikes. But no one complained either. The steering is so quick that manusevering required only a thought. Picking a route down through a fist-sized boulder strewn trail became a show of precision steering. Where a rider on amother bike might use the bigger hammer theory of descending, the Bridgestone rider refes on scalpel-like incisions to slice downwards. And once someone became used to the bike's feel and downwards. And once someone became used to the bike's feel and

started lowering the saddle for descents, we also noticed an increase in their downhill speed. The sense of almost perching over the front wheel on downhill seemed to be the source of any anxiety, not the handling.

On single-tracks, the MB-1 was a delight. With flicks of the handlebars, the bike swept along like a swift darting through the woods. The bike's agilty made riders laugh. Without a doubt, this was a fun bike in every condition.

Most of the components, primarily a Suntour XC gruppo, were excellent. The notable exceptions were the handlebars and grips. The handlebars were a high rise model while the grips were a hard plastic material with formed finger grooves, no one was particularly happy with them but evidently that is going to change. They're switching to flat bars with perhaps the excellent Grab on grips or an equivalent replacement. But even if they don't, making the change yourself is easily enough accomplished and certainly shouldn't preclude buying this blike if it suits you.

The only other change we'd recommend if you'd like to race or will spend most of your time in the dirt (and that's where the bike really shines) is to switch the Ritchey Quad tires for a more aggressive fire tread such as the new Ritchey force or the Specialized Ground Controls.

Other than that, this bike is ready to fly though there is a possibility it won't suit you. Not everyone enjoys the demands generated by steeper angles and short wheelbases. They definitely require more riding skill and more concentration. But for those who do, the Bridgestone MB-1 is certainly worth looking into, especially for the price.

#### Montaneus

Before we get on with how this bike rides (and that's the bottom line with any bike as far as we're concerned), let's get one thing out of the way immediately, the adjustable head set. This is not a gimmick nor is it meant to be changed instantly whenever the riding conditions change (though you could if you wanted to). It's simply one man's carefully thought out response to the universal complaints voiced by almost every bike tester, to wit: "the bike is fine but would be better if the head angle was such and such." Such statements are proof that there is no "right" geometry; there are only personal preferences. The Montaneus headset is a superbly engineered solution that enables any rider to quickly and easily set up the bike for his or her needs, to "personalize it" in the words of the bilde's designer.

Unfortunately, the head tube looks massive and ungainly though they claim it only adds four ounces to the weight. Given the conservative nature of the cycling industry, anything that looks different from the norm is immediately looked down upon, even by mountain bikers who are far more open minded than road bikers. Cannondalé's 24-inch rear wheel is another example of customer and even shop resistance to something only because it's different. So are the sloping top tubes used by Cannondale, Klein, Moots, and Rocky Mountain.

Still another mark against the adjustable head set is the need to have to adjust it. Mental inertia is a powerful force and many riders, even if they were given a Montaneus, would probably not bother discovering the bike's full potential because they didn't bother changing the head angle. That would be their loss since a great deal of creative thinking and engineering went into the design and it really does work. The Montaneus enables you to customize the bike to your needs. No other bike can make that claim that we

know of.

A fixed head Montaneus will also soon be available but that emphatically does not mean they're giving up on the adjustable head. It's simply that the majority of riders, whether justified or not, prefer fixed head angles. Consequently American Bicycle Manufacturing will produce their finely crafted aluminum mountain bites to those riders also.

Does the adjustable head angle really work. Without a doubt. You can change the angle from a low of 66 degrees all the way to 71 degrees plus you can set it up with a 69 degree angle with a short or long wheelbase, depending upon where you set the carm mechanism. At any angle other than the minimum, maximum, or 69 degrees, the front wheel will be offset to one side or the other. The distance is measureable but not visually without really looking

grind it out but not willingly. But that was only on really steep terrain when we'd have to lear well forward while crouching low over the top tube. On more normal terrain, we never worried about hitting our knees.

All in all, the bike was a delight to ride. The workmanship is excellent and the design very solid as far as its engineering is concerned. We still don't know why it is but we still notice a difference between aluminum and steel bikes. Aluminum has some quality that everyone likes. So with an approximately \$900 price tag, the Montaneus is quite a buy. Components are a good selection of Shimano and Suntour.

If the price range you're shopping is the \$900 range, and especially if you like aluminum, you owe it to yourself to check out the Montaneus. Soend some time with it. Change that head angle

Bikes

unheard of standard piece of equipment.

Geometry is the same as the Dakar's: 70-degree parallel angles with 18.25-inch chainstays on a 42.25-inch wheelbase. And just as with the Dakar, we found the chainstays a bit short considering the bike's relatively short wheelbase though traction was better than we'd expected. The short front/center evidently enables riders to keep more weight on the rear than might at first seem possible with those long stays.

Steering response was excellent, quick, light, and effortless. Single-tracking was a snap. But steep downhills were a bit trickier. That sheet front center causes more nider weight to bear on the front wheel during steep descents than you might want. Too much weight on the front wheel can make the steering overly sensitive, even twickly. So there was a definite tendency for riders to get way the same brakes front and rear rather than the more normal mixing of roller cams and contilevers. Not that we necessarily prefer one over the other. It just strikes us as more reasonable to use whatever brake is selected both front and rear. At least that way, you'll always have replacement parts if you damage one herake.

Components are selected from a variety of sources. Brakes are Suntour XC Sport, with Dia-Comp levers. Derailleurs are Shimano Deore with Shimano shifters. Shimano also supplied the triple Biopace chainnings. A six-speed freewheel and sealed hubs are also standard while the frame's constructed out of 4130 chrome-moly tubing. There are quite a few attractive bikes in this price range but the Dakota is certainly worth checking out. The design might just suit you to a T.



Lined up left to right: Montaneus, Jamis Dakota, and Bridgestone MB-1

carefully nor is it noticed when riding. The settings our testers seemed to prefer ranged from 69 degrees with the longer wheelbase to 71 degrees. Though the really shallow settings are reportedly for fast downhills, no one was happy with anything less than 69 degrees. The wheel flopping tendency of the shallow angles was too pronounced for our tastes.

The 69 degree setting was fine for all around riding though the consensus was that at about 70 degrees was even better. The 71-degree angle was great for slow speed handling and for nimble single-tracking. Changing the angle was easy enough but no one wanted to stop long enough to change it while out for a ride. We'd set it up then leave it there. But once everyone got behind the idea of adjusting it, invariably it was moved whenever a new rider took it out.

The bike was a real climber but for one drawback. Traction was superb and the bike encouraged out-of the saddle climbing except that the top tube was too short. We'd hit a steep hill and immmediately we'd bang our innees. So we'd sit back down and and ride the bike. And if the idea of an adjustable head just doesn't sit well with you, well, you can always wait for the fixed head bike. There's no questioning the company's integrity; they build good bikes.

#### Jamis Dakota

The Dakota is cousin to the Jamis Dakar, tested in the March/April issue. And with its approximately \$480 price, its a pretty attractive cousin. The bike was one of the very few we've seen come complete with water bottle cage and even a water bottle. Plus, and this was particularly unusual, a carrying strap is also included. But then the Dakar even included a pump, an almost

From left to right: Panasonic Pro ATB, Redline Conquest, and Bianchi Super Grizzley

back on radical downhills.

Otherwise, the biske delivered fun performance. Riding positioning was comfortably upright while the rear triangle made for a pretty smooth ride over rough terrain. Because the dimensions were the opposite of so many other biskes we've been testing, it always took a few minutes to get used to the Dakota's feel. Where others tend to shorten the back and lengthen the front, Jamin did the opposite and that was always immediately noticeable. It wasn't a problem, just different. Body english strongly affected the biske's handling but once a person got used to the biske's responsiveness, traversing rough passages out-of-the-saddle turned into a lark.

Jamis' objective was to design a bike for all around riding and especially touring. Full braze ons for racks and two water bottles are standard as are Ritchey Quad tires. We were at first surprised to find Suntour XC brakes front and rear considering the bike's price but with the ever more competitive reality of mountain bike sales, such niceties are becoming necessary. We were glad to see

Bianchi Super Grizzley

Celeste Green on a mountain bike? Yep, Bianchi has done up its top of the-line off-roader in Celeste Green. Some of you might remember Bianchi's survey on whether they should continue painting their superb road racing bikes Celeste Green. The outcome was evidently an overwhelming affirmative, a decision everyone here certainly agreed with though no sleep was lost over it. Now that it's appeared on the Super Grizzley, we almost think it's even more appropriate on mountain bikes then on road racers. The color is absolutely beautiful out in the woods.

It was an eye catcher too, never falling to immediately capture people's curiousity. But the finest paint job in the world won't get you down the trail any faster so questions quickly were steered around to how the bike rode. We're pleased to say that the bike's performance was fine. We liked it. We wanted to like it. Why? Well, there's a certain magic about Blanchi road bikes, especially the Celeste Green racing bike with stitched on leather handlebar.

### Bikes

### Sizing a frame

Over the years, the various cycling magazines have all had acticles on sizing road bikes including what are in effect formula determine a rider's optimum frame size, crank length, stem extension, etc. Evidently mountain bikes have thrown a monkey wrench into these sizing formulas. Off road requirements have dictated higher bottom branchets, longer wheelbases. Sucker dictated higher bottom brankers, longer wheelbases, stacker angles, etc. Plus there's been a general turning away from what many off rousders perceive as extremism on the part of road frame builders with their steeper and steeper angles and shorter and shorter wheelbases. Adding to the sizing confusion is the lack of a standard measuring system for mountain bike frames. Some consumers may walk into a bike shop with no idea what size frame

settling on the correct size can seem quite a puzzle.

We have no formula that will magically solve the difemma. But we can offer a few guidelines that should help.

First, locate a bise shop with employees who instill in you confidence they know what they're talking about and who are willing to work with you to insure your satisfaction. If for some reason, no such shop exists where you live, be sure to let the shops know what you're thinking. Without that feedback, they may never be inspired to learn and improve and you'il never have the lond of service oriented shop every mountain biker needs. Then try out as many bikes as possible demo bikes, friends' bikes, anything and everything. Don't worry about price. You're educating yourself, not buying a bike at this point.

Pay careful attention to what each one feels like. And not in terms of speed or handling but rather how do you feel when you're on the bike. You're the one who's going to be spending hours on

this blike so be sure you can live with it. Selecting the correctly sized blike is ultimately your responsibility for no one else will know how you feel on the blike.

Now, as far as general guidelines are concerned, first, buy the

smallest frame you're comfortable on, repeat, that you're comfortable on. Avoid at all costs the syndrome of the woman who insists her foot is only a size 7 when in fact it's a 10. Ignore the insists her foot is only a size 7 when in fact it's a 10. Ignore the actual frame sizes and concentrate on how they feel. Every manufacturer measures differently and one company's 21 inch bits may be another's 23 inch. Houghly speaking, a couple of inches of crotch clearance over a horizontal top tube (imagined if the bits has a sloping top tube) when you're standing flat on the floor is

Determining do frame is the right size requires eliminating the adjustable variables: the saddle position; handlebar extension; width, and bend, and crank length. Check to see where the saddle is located on the seat post. Is it forward on the rails or back? That saddle position affects your position relative to the cranks. Ask the shop person to explain if you don't understand. A frame may feel too long for you while in fact the saddle was simply too far back on the rails or perhaps the stem extension was too long. Some riders parefar a relatively upright position on the bible. Others, usually more competitively oriented riders, prefer a lower handlebar position relative to the saddle health so your leg is almost extended when your foot is at the bottom of the stroke. Now ride the bike.

sure to differentiate between strain caused by muscle discuss and strain caused by an ill fitting bitselt, that lets you come out of the saddle them as thack down easily and smoothly, that has enough room for you to climb a steep hill standing up without banging your knees on the handlebars, that lets you mount and dismount without feeling like you're borrowing your big brother's or sister's

Once you've discovered what such a frame feels like, then you can concentrate on a bike's handling characteristics. Willingly liste can concentrate on a bike's handling characteristics. Willingly listed to any advice proffered. If someone has some sort of frame fitting method, try ir. You'll probably learn something even if it doesn't work out for you. Keep listening to the messages your body is sending. If you first establish your body's cycling comfort zone the worry about how a bike rides, you're insured of years of ricing pleasure. And if as your skills improve, what's comfortable also changes, don't worry. That's just part of a mountain biker's natural evolution.

grips. That machine is beautiful. We knew ahead of time that the Super Grizzley is built in Japan for Bianchi and that it's not remotely in the same class as its hand built racing big brother. Nevertheless, opening the box and seeing that color immediately brought to mind the image of that sleek road machine. No doubt that was Bianchi's intention. Well, it worked. Consequently we wanted to like the bike.

The geometry is tight and steep, 71-degree head and 73-degree seat with 17.5-inch stays on a 42.75-inch wheelbase. It's a bike that demands the rider's attention when traversing rough passages. typical of any bike with such a short, steep design. The bike excelled on single-tracks, the twistier the better. Obstacle dodging seemed to entail little more than a thought. On hard surfaced dirt roads, it felt almost like a road bike. Riders just put the hammer down and flew.

Hills are what brought out a problem in the design. We tended to come out of the saddle for climbing but whenever we did, our knees were in danger of banging the handlebars. The steeper the hill, the more likely that was. Finally, we gove up and remained sitting. But then the 28-tooth granny wasn't small enough so we found ourselves pushing up hills we were sure we could have ridden if we could have stood up. But that was only on pretty steep terrain. The rest of the time, the positioning was fine.

Any experienced rider who got on the bike immediately felt at home. It's definitely a rider's bike, one any roadie will be perfectly comfortable on. Positioning over the cranks is just right for efficient pedalling. The handlebars fall right to hand and the steering is light and fast. The bike felt right

The frame is lugged and nicely finished. Components are basically a Suntour XC gruppo including front and rear brakes, levers, hubs, derailleurs, shifters, and stem. The seatpost is wonderfully long with extension calibrations marked on it. The only two gripes we had with it were the grips and tires. The grips were the soft rubber type that seemed to be on almost every mountain bike in the past but have fortunately passed away. Contrary to what some think, soft grips are not more comfortable on rough terrain. They just kind of squeeze down until you're practically holding onto the metal. Replacing the grips with something like the Grab-on grips is highly recommended. The tires, though they had

a definite off-road tread, didn't seem to have the traction of many other tires on the market. The same tires have appeared on a number of bikes with always the same result: not as much traction as we expected. There's nothing wrong with them; it's just that superior treads are available.

Priced at about \$620, the Bianchi might just be the bike you were looking for. It's certainly not alone in that price range so you'll just have to decide for yourself if it fits you and if the package is the kind of value you're looking for.

Fisher's new Fastrax tires.





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### Bikes

#### Redline Conquest

This bike became a real favorite around the office, much to our surprise. Not that we had expected it to be a dog or anything, not at all. It's just that we've developed a bit of a bias for the expensive custom bikes that pass through our hands. There's something about pedaling around on a thousand dollar plus bike that never fails to turn everyone on. For that much money, the bikes better be good and invariably they are.

The only reason mass production bikes generally don't provide the same level of performance as custom bikes is their need to appeal to a wide spectrum of riders. The small shops can afford to focus on the sport's aficionados, riders willing to drop a grand or so to get exactly what they want. Even within that small segment of the market, each builder is in effect specialized, each one appealing to a different buyer. Not so the the high volumn manufacturer. Their bikes have got to satisfy different riders, each with a different body. That means compromises. Those compromises might be subtle but nevertheless, they're noticeble.

The Redline Conquest is no exception in this respect but the final product is wonderful to ride. The chainstays are a relatively short 17.5 inches on a 43.625 wheelbase with a 70-degree head tube and a 71-degree seat tube. The blke's handling was

### Weight

Invariably the first thing anyone does when checking out a mountain bike is lift it. Everyone wants to know how much the bike weighs. Complicating all this is that allmost without exception, manufacturers exaggerate their bikes' lightness by a pound or two and sometimes more.

and sometimes more.

Most bikes weigh between 27 and 31 pounds. In fact, 27 pounds is pretty light. We've seen less than a handful of bikes (21 inch size) come in under 27 pounds. Bikes are also usually weighed stripped: no water bottle brackets, no water bottles, and no pump. Tire sizes can also radically affect a bike's weight. With 1.75 IRC X.1 Racers for instance, you're looking at an exceptionally light set-up, about 600 grams per tire. The same bike with 2.0 Ground Controls (about 200 grams) will weight about a pound more. But the ride difference between the skinney and fat tires is considerable. Few riders use the skinnier tires on rough serrain. So for an accurate weight difference between two bikes, weigh them set up with comparable equipment.

comparable equipment.

But weight can also be over emphasized. True, if you have two bioses and all things are equal but one is two pounds lighter, you'll probably buy the lighter one. But rarely are all things equal. How the bike fits you and whether its handling is compatible with your riding style is more important than the bike's weight.

So when you're shopping for your new bike, ignore weight. Test bikes until you find some in your price range that seem to be what you're 'cocking for. Set them up the way you'll ride them and then weigh them. Don't worry if the shop's scale is particularly accurate or not. You're only interested in their weight relative to each other.

If weight is really a concern, be prepared to pay more money for whatever bike you buy. The less bike you buy, the more it'll cost. impeccable. The more we rode it, the more we liked it. It's only lacking was on really steep terrain. When we came out of the saddle, the rear wheel spun. The degree of frustration this invariably engendered was indicative of how much we enjoyed the bike. The Conquest handled so well, was so easy to manuever, we expected it to fly up any hill. When it didn't, we were always amazed. We had to stay in-the-saddle to maintain traction. But that only applied on the steepest hills. The bike's climbing ability was fine everywhere close.

The positive side of the long wheelbase is the bike's smoothness. It ate up rough passages. But where the bike really shone was on single-tracks. We rode it fast over rolling, twisting trails and the bike was superb, agile enough for the most aggressive riders yet not so demanding that only experts could enjoy the ride. The 70-degree head angle is partially responsible for that. The steering was quick and light but without the sensitivity normally associated with steeper head angles. Had we known in advance that Richard Cunningham was the bike's designer, we would have expected excellent handling. Richard is designer, and builder of Mantis bikes and his reputation as a builder of exceptional mountain bikes was firmly established long ago. His venture into the realm of designing mountain bikes to be manufacturered in Japan for mass distribution in the States has done nothing to tarnish that.

Components are as usual what you'd expect from a bike in the S7D price range, Suntour XC for the most part including brakes, derailleurs, shifters, brake levers, stem, hubs, and seat post. Rims are 1.5 Ukai with Panaracer knobbles. A 6-speed Suntour New Winner freewheel and Sugino AT crarik set with 2-636-46 chain rings make the bike go. The frame is tig welded out of butted tubing and firished in a handsome rose-gray color. An Avocet Tourine 1 saddle firishes it all off.

The only two things we'd have liked to see on the bile, especially considering its price, were quick release wheels and Suntour XC Comp pedals with clips and straps. A flat bar would have been preferred also but that is strictly a matter of personal preference.

The Redline Conquest is up against some pretty stiff competition in its price range but there's no doubt in anyone's mind that it will do well. The bottom line with any bike is how it rides and in this, the Conquest shows. It's a lovely bike to ride.

#### Panasonic Pro ATB

If there's currently a standard production mountain bike chainstays and 43 inch wheelbase. Such bikes have been with 18 inch tested with excellent results. The design does most everything well tested with excellent results. The design does most everything well though no one characteristic is particularly remarkable. What you get is solid, reliable performance with a smooth ride, steady steering response with a touch of heaviness a slow speeds, and an ability to eat up transitions and obstacles on downhils. While some might argue forcibly for another degree of steepness in the head tube and maybe half an inch cut off the chainstays, their arguments are strictly subjective. Based on sales of such bikes, consumers are obviously happy with what is now considered a somewhat conservative sementry.

The Panasonic Pro ATB fits precisely into this category. Its ride was exactly what we've come to expect from this kind of geometry. In fact, none of the testers had any idea what the angles and



Custom built for you by Muskie

dimensions were but most correctly guessed the geometry. At first, the bike felt a little slow, the steering a tad heavy, the wheelbase perhaps too long, maybe even 44 inches or longer. But then as we settled in on the bike, got the muscles loosened and warmed, and started riching more aggressively, the blue's nature seemed to perk up. By the time we hit the first rolling, twisting single-track, the Panasonic no longer seemed long and slow. It was almost as if the bike responded to our changes in attitude.

Before long, we were flying, having a ball, thoroughly enjoying the performance, the trail, and the day. Richers who initially thought they'd only be out for a short ride invariably rode much longer than they'd planned. But that's typical of such designs. First impressions are not too strong, sort of the strong, silent type. But once a rider settles in on the bike, the previously understated personality comes out of the closet and away you go.

The design may be conservative but it's also reliable and undemanding. Where steeper, shorter frames require a higher level of rider concentration and awareness, the more relaxed designs seem to perform at whatever level you want. If they have a fault, and there are certainly those who would argue this point, it's a slight lack of response when driven hard by an aggressive rider. Climbing traction is also reduced because of the long chainsteys. Steeper hills had to be taken in the saddle.

The Panasonic Pro ATB's component selection held no surprises, mostly Suntour XC components including a Sport rear brake, XC hubs, deraileurs, shifters, and levers. The front brake was a cantilever while the rear roller cam was mounted under the chainstays. We recommend changing the soft, foam grips for some Grabons or hard rubber grips and switching the too short seatpost for a longer one. For some reason, quite a few bikes seem to be equipped with seatposts that turn out to be too short for a rider who in all other respects fits the frame. Our only other complaint was the tightening bolt on the stem; it had an amazing lenack for just catching a rider's knees whenever we came out of the saddle.

The Pro ATB's (that was our biggest gripe with the bike-its name) approximately \$620 price tag places it squazely in the midst of the hottest contested price range so you'll have to decide for yourself its relative value. Muskie

Surprisingly enough, there aren't too many true custom mountain bikes available. There are certainly plenty of beautifully crafted hand built off-roaders available but they're not custom bikes. Each builder has settled on a geometry for each frame size and that's what they build. By custom, we're referring to a bike designed specifically for its owner. Until now, the only custom builder we knew of was Scot Nicol of Ibis Cycles. No longer. Bill Musgrung III has thrown his business card into the fray with the Muskie.

Chances are you've never heard of him. Previous to getting into the off-road business, he built road frames and not too many of those. Certainly not enough that he'd become a household name amongst custom frame purchasers. He was simply one more small shop builder known only to a few knowledgable riders, usually locals in the city or state where he worked. Bill stayed away from mountain bikes because he didn't think there was a market for custom bikes. Requests from customers changed his mind. Now he's seriously into building off-roaders.

Testing one of his bikes is almost impossible. Not because they can't be ridden but because it won't necessarily be representative of what you'll get if you buy a Muskie. Remember, each bike is built to the buyer's specifications. There's no set geometry. Every bike is different. The one we were able to ride was one Bill had built simply to demonstrate his workmanship.

The frame was constructed out of lugged Prestige tubing, It's quality was exactly what you'd expect from a custom builder, exemplary. The bike was smooth and solid yet jumped when we hammered the pedals. There was no questioning its performance pedigree. But because it wasn't built to our specifications and was only a model built by Bill as a demonstration bike that he also kept as his own, it was a tad too big for all the testers. Bill's a pretty good sized fellow while all of us are pretty typically sized. The

handlebars were also risers that definitely placed our hands too high for efficient riding considering our size. Nevertheless, the bike

Why buy a custom bike? Well, there's no real reason to. Existing production bikes will probably provide just as much performance for far less money. Some people simply prefer a hand built, custom bike to buying one off the shelf, so to speak. Advantages are varied.

Number one is pride of ownership. There's a certain feeling about having a bike built just for you, one whose workmanship is almost a work of art, whose paint job is unique. You know you'll never see another bike exactly the same.

Secondly is getting a bike that fits you perfectly, whose wheelbase is precisely what you want, whose chainstays are to your desire, and whose geometry provides exactly the kind of ride you want. Of course, to capatalize on all that, you have to be a knowledgable enough rider to understand what you want and then be able to communicate that to the builder. That's easier said than done. Fortunately that's part of the builder's skill: being able to translate what are often vaguely expressed desires into angles and lengths. Designing a custom bike is really a partnership between the builder and the owner working together to create the perfect

That's why they're expensive. Is it worth it? That's up to you to decide. But if you ask almost any owner of a custom bike, road or off-road, no doubt you'll get a very positive response. The best way to finally decide whether that's the route for you is to talk to the builder; then decide

#### Specialized Rockhopper

Small riders rejoice! At last, there's a frame for you and you don't have to pay a fortune for it: a scaled down, 16.5-inch version. of the popular Specialized Rockhopper that's been proportioned specifically for you. The most obvious difference between the 16.5inch frame and its larger brothers are the 24-inch wheels. A year ago, Specialized came out with a small version of the Stumpjumper Sport equipped with 24-inch wheels. For unknown reasons, the bike didn't sell at all. Evidently the smaller wheels turned off customers so Specialized stopped manufacturing it.

This year is different; small wheels are no longer being rejected. In fact, from all reports, you may have a difficult time even finding one of these small Rockhoppers. Most are sold before they even arrive at the shop. It's a fickle world and almost impossible to guess which way people will jump next. But maybe the small Rockhopper's success will convince Specialized to reintroduce the small Sport. If they do, short riders will be in fat city with two excellent bikes to choose from. Not that Specialized is the only company producing small frames; they're not. But you can count on one hand the number of bikes currently available for anything less than a grand.

The Rockhopper is an impressive bike considering its price of some \$450. What that will buy you is a double-butted chrome-moly frame with chrome-moly stays and a chrome-moly Unicrown fork with forged drop-outs. A 70-degree head tube combined with a 72degree seat tube is a slightly relaxed version of the highly esteemed Team Stumpjumper's 71/73 angles. If the geometry has a lack, and this is purely subjective, it's the overly long chainstays. Some feel they adversely affect the bike's climbing ability though others appreciate the bike's smoothness on rough ground. Admittedly, any lack of traction only comes to the fore on steep terrain and it may well be true as some claim that anyone who purchases a



Rockhopper will probably be pushing up steep hills anyways. Component selection is part of what makes this a good buy:

Shimano Deore XT cantilever brakes, levers, derailleurs, and shifters, Shimano 600 5-speed freewheel, Specialized sealed hubs. triple crankset, stem, riser handlebar, headset, Lambda saddle, and Saturae X-28 1.5-inch rims with Crossroad 1.5-inch tires. We particularly appreciate the leather saddle with an adequately long seatpost, one area many another manufacturer doesn't pay adequate attention to. What we didn't like were the tires. They're fine for pavement but off-road, they're far too skinny. And as usual, we would have preferred flat bars but the risers are certainly comfortable around town where apparantly most Rockhoppers are ridden. But we suspect that because of the limited number of small off-road frames available, this sized Rockhopper might see a much greater percentage of time off-road than the larger frames. But again, it's probably just a matter of talking to your dealer to get whatever changes you need to convince you this is the bike for

The bike's handling is exemplary. The steering is quick and easy and as much as anything the source of the bike's nimbleness on single tracks. No doubt because of the frame's small size and the typical rider's light weight, the rear triangle is more than adequately stiff for out of the saddle hammering. Some heavier riders have complained about a lack of stiffness in the 21-inch frame size but that's not the case in the smaller sizes.

The steeper than average seat tube made for easy standing/sitting transitions while placing riders in a strong position relative to the pedals. There's also plenty of clearance between knees and handlebars for out-of-the saddle climbing. In short, the bike was fun to ride.

But it's real strength was the frame size. Every rider who got on it immediately exclaimed on how easy it was to ride and how comfortable it was. That was due as much as anything to their having been stretched out on bikes essentially too large for them before. Getting on a frame sized appropriately for them was such a treat that no one wanted to give the bike up. A friend brought along her 17-inch Stumpiumper Sport with 24-inch wheels and her bike got the same reactions. Now, if only Specialized would reintroduce that model and maybe a few other builders would get into some smaller frames, all you riders out there who have always found yourself settling on a bike that's really too big for you won't have to suffer anymore.

Occasionally we receive a complaint that our bike tests are lways very upbeat, that we never criticize the bikes. That's true, we don't. For good reason. Of all the blives we've tested, none has seen bad. They're all good. It's just a matter of personal choice and judget considerations which you prefer.

We also don't spend enough time with the bikes to point out ny weaknesses in their construction. We may see something that

We suspect fingly or a weakness out without experted in the fact a problem, it's not fair to suggest that it might be.

That role is your local bike shop's. They see the bikes day in an one of the bikes that it might be.

The role is your local bike shop's. They see the bikes day in the ones who hear about it, not us. Our responsibility is to provide basic information about the bikes—what they were like to ride—to help you narrow down what bikes might be of interest to you. But then it's up to you to shop around and learn what the shops' experience of the bikes has been and to test bikes until you find

The entire subject of testing bikes is rife with traps. If we prefer one kind of geometry over another (steep vs. shallow, short heelbase vs long, etc.) and say so in the magazine, in effect we're nutting down the geometry we don't like. And that is strictly a natter of personal opinion. Someone else may love the geometry

deterent operators.

During the past year, all of us who have test ridden bikes have sampled an amazing array of bikes from just over \$300 clear up to \$2,300. I have no doubt we've seem just about every geometry mix that's ever been dreamed up. And we've definitely liked some bikes more than others and that's probably come out. But we have yet to ride a bike we didn't like. There are a lot of fine bixes out there so if you can't find one that suits your taste, you never will.

We may not appreciate some image a company is attempting to togect or we may not like how they operate but we have to admit hat so far in our experience, they're all intent on producing qualit nountain bikes. We the consumers are in a no-lose situation

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### A Mountain Bike Journey

### Story and photos by Kenneth Edson Youngblood

Tires thud over the potholes as the picture drones along 28N toward Long Lake in the heart of New York's Adirondack Park. Laurel and I are squeezed in the back with tent, backpacks, parmiers, sleeping bags, and five mountain bikes. We'd climbed and swum and biked all over the Adirondacks earlier in the summer but now, October's air is cold and we're zipped together in two Northface bags and looking over the talgate at the crowns of trees in their peacock colors.

Laurel lifts one mud-splattered leg. Her socks and shoes are caked in a gray monochrome interrupted only by the green tatters of a trash bag sticking out. She pulls at a thick strand of hair which, after two combless days in the rain, lies plastered on her head. "Ain't I a lady," she says and learns over to kiss me. My ten-year old, Todd, raps the rear window and smiles and wags his finger at us, beneath his mock paternal smile a man-child's face.

What a difference a day can make. Yesterday, Todd and I were in the cab together, driving to Coreys. He'd whined on and on like a three-year old. Saturday was cartoon day...He was missing Spiderman. Voltrons, Hulk Hogan's Rockin Wrestling, and Transformers... He didn't want to come on this dumb trip in the first place. I told him this would be a real advanture, crossing hventy six miles of Advandack wilderness by bike. He would be the first boy to bike from Coreys clear to Newcomb riding nothing but dirt trails. 'Right through Cold River, you know,

Noah's stomping grounds, the hermit." His blue eyes flashed steel arrows.

"You gotta be flipso to go out in this rain."
"Where's your hat? I'll bet you didn't
even bring a hat."

Our words push against each other until the conversation falls apart. We ride in silence up the Coreys Road, past the empty parking lot at Axton Landing. We'll have the woods to ourselves, thanks to the rain, but he's right, here it is, the peak of leaf peeper season and even the adults are home watching to.

I look in the rear view to see if Larry's still following though he knows where the trailhead is. He works as a biologist for the Adirondack Survey Corporation measuring the effects of acid rain on Adrondack water. For the last two years he has lived outside, camping besides the lakes he tests so he got to know the Adrondacks intimately in a short time.

Laurel is already at the trailhead when we pull up. Larry and his wife, Dee, help us unload bises at the trailhead while Todd, using a branch as a bazooka, plays "Codename: Zap" and sings "G.L Joe. Great American Hero". I violate our ceasefire long enough to make Todd feel like the latte red hen. No wonder he chooses to go with the others when they take the truck around to the pick-up spot in Newcomb.

I remain behind in Laurel's car and watch the equipment. Rain drones on the carnos tarp I hope is keeping our clothes and sleeping bags dry. I'm shivering in my cycling shorts after an hour. I turn the radio on, sneeze and blow my nose, I remember stopping for gas at the Ultramar on the way out of Saranac Lake: Barbara, the cashier, stares at the bicycles in the back of the truck and says, "You're not going to take him out in this! Look at that rain."

'Tm the one with the cold," I mumbled. She threatened to turn me in for child abuse, Maybe she was serious because she said again, "I can't believe you're going to do this to him."

Rain beats harder on the canwas A Montreal station reports no change in the weather: rain, lows in the forties, colder at night, especially in the higher elevations. My nose unclogs suddenly and I reach for my handkerchief and wonder if I've overdone it again.

When Todd was eight I took him for a couple of fifty mile bike rides and he quickly grew to hate bikes. He preferred sitting in the house and watching hour after hour of to while I wanted to go biking. Television was displacing me as his role model. We fought-and for the first time a father found himself on the other side of a generation gap. Then mountain bikes came along. He wanted one and I bought two.

"Eighty miles round trip by road makes you think what we're getting into." Laurel shakes her head and looks up at the dripping sky. They didn't get back from Newcomb until mid-afternoon and I wooder if we'll cover the eleven miles to Shattuck Clearing by nightfall. Neither set of panniers fastens properly but they're all we have. The rest of our geen we'll carry on our backs. Dee has a cold too and just before we get on our bikes, she distributes throat lozenges from a ziplock bac.

The first mile and a half climbs what the horse people call Mud Mountain because it's wet the year round. The trail has been churned into a slush by horses. We walk, pulling and pushing our bicycles through one quagmire after another, the mud constantly sucking at the wheels and our feet.

Todd pretends he's "Codename: Footloose" on maneuvers and wades through mud up to his shins. I warn him about keeping his good sneakers dry then slog ahead while he falls farther and farther back. He's out of sight when we finally reach the last steep slope. Horses have gouged and kneaded the mud. We have to plant our feet, lift the blike, lock the wheels and find the next foothold. Plant, lift, brake, Dee, Laurel, and I inch our way to the top. Sweating and out of breath, I'm sure Todd is sitting with his arms crossed at the bottom of the slope, ready to give up and go home.

But why should he? He's already as tall as Dee and in another year he'll match Laurel for size and they're both keeping up. I lean the Rover Sport against a tree and glissade back down the hill.

Larry's walking behind Todd. Todd grins. "You were right, Dad, I needed a change of clothes." Mud blackens the front of his army camies. "Sorry, I fell in."

A bubble of anger welling up inside me instantly vanishes. I take his bike on up for

We skid hell bent down the other side to where the trail flattens and swings south. For the first time biking is fun. We roce like a pack of wild horses up and down the hills, changing leads, jumping culverts and small blowdowns, and dodging rocks.

Todd sits on his bike on top of one hill, drinking juice from his water bottle while waiting for us to catch up. "Who's the leader now. Dad?"

I want to remind him that I am carrying a pair of panniers heavy with food and the

five-[person tent in addition to the backpack. Instead, I shake his water bottle.

"Almost gone," I say. "Remember, seven bottles have to last five people two days."

"See you," he says and is gone. Laurel nudges me and says the cold must really have me down.

I close my eyes and shake my head.
"What a grump, huh?"

Dee gets to the top. Her chain had slipped off. I picture a mangled link and wish I had brought a rivet extractor. Anothing could go wrong-a derailleur twisted beyond repair, spokes sheared by a branch or the chainring smashed beyond repair, spokes sheared by a branch or the chainring smashed going over a rock, a leak in our only tire pump—we didn't come equipped with the right tools and spare parts for a backcountry journey. If something does go wrong, it'll be a long walk out.

Todd pretends he's "Code name: Foot-loose" on maneuvers and wades through mud up to his shins.

We rumble across a second plank bridge and honk up the last long grade. Down the other side we plunge, steering and powering our way through washouts and sliding down gravel runnels slick with leaves.

Both lean-to's at Calkins Creek are deserted. They're warm and dry, islands of calm within the wet storm. With almost five miles to go to Shattuck Clearing, we decide to make camp early while there's still light enough to gather firewood.

Todd won't help. He wants to explore the stable and play along the creek. Laurel and I wander in the woods together, looking for standing dead wood for a fire. I mention my frustration about Todd. She says, 'He waas so proud to be the first one here today. You should have seen his face. But you didn't. He wants to please you so much."

The common chores of camp life bring us together: bucking firewood, feeding a smokey fire, sorting food, cooking. Larry and Dee recount how they met working as raft guides in Glacier. They talk about other gigs in what they call the river community-word of mouth jobs as guides running rivers up and down the Rockies and all over the northwest as far as Alaska

Todd doesn't help and when I go to get water, he's throwing stones into the creek. I take one out of his hand and put it back on the ground, lecturing about how in one fing he is undoing the work of billions of

Rain splatters on the coals and with the wet wood, smokes the beoling chicken. Todd comes over, tilting a water bottle to his mouth. With his other hand he reaches down and pulls a burning limb off the fire. "My lasar sword," he says and waves it so the red embers flare across the darkening stop.

"Look what you're doing to the fire!" I say, grabbing the stick and putting it back. Then I shake the nearly empty water bottle and ask, "Your second one?"

Larry says he'll build up the fire again. He'll fill the big pot with creek water and let it boil. By morning it'll be nice and cool and safe to drink. He nurses the fire and I wonder aloud at how easily he got it to catch. He says, 'Mine's a twenty-four hour job; you learn to live with the rain."

He tells about the time he was working up in Stillwater. Weather so bad, the chopper couldn't make the food dropthree days without eating.

Knowing he'd have fillnets for the fish counts, I say he must have eaten a lot of trout

"You kidding, over a third of the state waters are dead now. Most of the Stillwater ponds. In three days we came up with one dead bullhead."

The way he talks, biology is his true calling. But the bucks aren't going into biology these days. The acid rain project will be done in another year. Then what? There's no work, One biologist he works with-a man in his fifties-moved his whole family up here for a lousy three year contract.

Dee says they don't want that kind of life. "We're looking at our thirties," she says, "time to think ahead." They're planning on going back to Alaska and starting up their own quide business.

Todd comes over and borrows my Swiss army knife. When I look up again, he is carving "G.I. Joe" on a lean-to log. I take the knife away, asking why he can't find anything better to do. By the time the chicken is barbecued and the potatoes raked out of the coals, Larry has to light a cancile and set it in the middle of the picnic table to eat by. We trade memories of the day spent mountain bidan.

Laurel liked traveling all afternoon without passing another soul. Dee asks if we had heard that the Adirondack Park Agency was proposing a ban on mountain bikes in New York's new Stare Land Master Plan. I had. And when I heard that a guide from Requette River Bike and Boat had push-pedaled from Coreys to Newcomb by trail, I wanted to make this trip before mountain bikes were prohibited in the High Peoks Wilderness Area.

Larry doesn't think there are enough mountain bikes up here to be a problem. He questions how much damage we did, even riding in the rain.

"No real steep grades to tear up," Dee recalls. "Except that first one and the horses did more damage than tires ever would."

Larry says these aren't the mountains out west. In the Adriondecks, the land quickly heals itself. His opposition to the APA proposal is surprising. Not just because he is a biologist but because when he talked about his work, he spoke about the Adriondacks with love. Acid rain seemed to hurt him as much as the environment.

What harm can a few bikes do?" Larry asks. He didn't like policy decisions not based on enxtromental impact study. He recalls guiding for an elle hunting outfit in Montana. "Rules were no grazing the horses, so we had to pack in hay and grain for the horses to eat, took 30-40% of our capacity, and no one kicked, but this? The APA goes too far." In all his experiences

out west, the concept of multiple use was part of any wilderness planning. "To the APA, multiple-use means backpackers."

After dinner Dee digs one of Larry's water sample bottles out of a knapsack and pours a little finger of apricot brandy into each of four enamel cups. The sweet taste of apricot warms my mouth and heats my throat. I offer the cup to Todd, but he wrinkles up his nose. Only last week he had swaggered around the kitchen table, holding a bottle of vodka by the neck and pretending to be drunk. I poured him half a glass and told him to drink up. One gulp and he was queging.

Now I put the brandy to his lips and say, "A sip, just enough to warm your throat, savor it." He tastes it and wants more. "See," I tell him, "a little sip won't hurt you."

We are all tired and wish we didn't have to lay out our sleeping bags in the dark. Todd tells us to look into the next lean-to. There our bags are waiting.

The zipper on Todd's bag is broken. He crawls into the double bag between Laurel and me. We sleep snugly until a downpour wakes us in the morning. Todd

says he dreamed of kissing pretty girls. "But, Todd," I say, "you're too young for that, you're just a boy."

"Not in my dreams, Dad. I was a man."

Blue sky and warm sun break through the nimbus slate by the time we eat, pack, and roll across the planks bridging Calkins Creek. I had biked this far once before then turned around and gone back so the creek crossing is new for me. My breath catches in my chest with a shaver of wilderness adventure. But it goes away quickly when I remind myself there are trail markers and topographic maps to follow.

The climb out of the Calkins basin begins with a long walk up a sandy grade too mushly for our knobby tires to grab. One after another we congregate on top. Already, Todd is last. Soon we are roller coasting up and down hardwood glens. New-fallen mapile leafs lie in a fulfy blanket of reds and form a slick surface hard to read. Sun shimmers off their wet skin, dazzling my eyes attempting to search underneath for protruding rocks.

In the hills above Boulder Brook we tunnel through conifers. The contrast of dark green and gold startles us and we ride hushed but for the steady ratcheting of our freewheels.

Larry and I come to a fork in the trail and stop to check the map. Todd catches up and his face tells me that he too feels the morning's promise of a good ride. He doesn't want to wait for the others. I tell him to go ahead but wait at the next fork. The map shows the left trail going to Latham Pond and the right dropping sharply in a lone bend toward Cold River.

This time Dee is last. I look at her drawn face and realize she init used to bicycling. A quick downhill race and we reach the river. Todd is waiting where the trail branches east and west along the bank. A trail market says the east trail leads to shelters. We think the bridge over Cold River lies to the west but Larry gets out the map to make sure. Todd wants to scout ahead and I tell him not too far.

Five minutes later we follow him down a short grade to a clearing by the river. Todd is nowhere in sight. We can see a trail on the other side but no bridge. The four of us stand on the high bank where the bridge used to be, watching Cold River, swollen with rain, swiftly flowing over rocks. Larry whistles and wonders how anybody could cross in the spring. Dee looks at the cold, gray water and frowns. I search the bank and ask, "Where is he?"

We spot a faded trail marker pointing to the other side and saying "Shattuck Clearing". The map shows a bridge but the map is based on a 1953 geological survey. Time has changed things. An overgrown trail continues along the river on our side but nothing corresponds to it on the map. Todd emerges from the trail, pumping furiously and imitating the loud hum of a motorcycle. "What'd I tell you about going

ahead?" I shout.
"Just checking it out...doesn't go anywhere." he replies.

A dull ache grips my stomach. What do we do now? Turn back? We can't afford to waste much time if we're going to get out before dark. Larry thinks there might be a footbridge up by the lean to's. But Laurel says that's a mile up and back, just to find out. Every mile, every hour counted.

"We're halfway," I offer. "Once we cross, there's no turning back."

Todd takes that as an answer and skitters down the bank. His wheels plunge up to their hubs in water and come to a sudden stop. He stands in the river, water up to his knees. Surely now he'll catch a cold.

Dee and Larry draw away to themselves, their talk private. The journey is telling on us. Laurel says, with Dee's cold, she's feeling weak and Larry wants her to keep up. I realize that pushing Todd the way I have, pushed the others too hard.

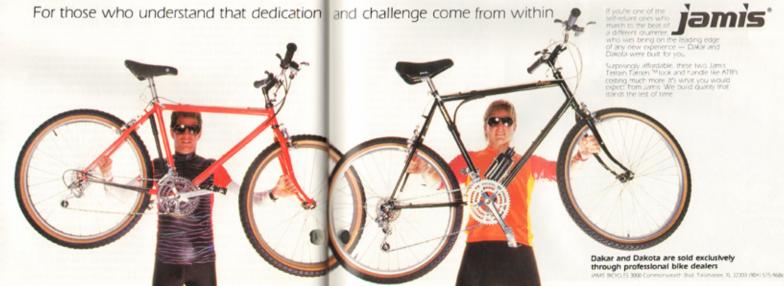
Dee says "Let's go for it" and, one by one, we wade across, our bikes on our shoulders. Halfwey across, Dee loses her grip on her Cannondale and it almost washed downstreams. This trip will test sealed bearings, I think. Everyone rests on the other side and eats kinch. I make Todd change his wet pants. He doesn't have any dry clothes. Laurel lends him sweatpants and he disappears into the millowed.

He can't get the wet pants off, he shouts, and I tell him the air is cold. If he doesn't change, he'll get pneumonia.

A mile from Cold River, we come to a fork which according to our map should lead to Moose Pond. A wrong turn and we'll have to spend another night in the rain with colds, wet clothes, and no food. At work they'll wonder why I didn't show up and Todd's mother will be worried sick. Fears and uncertainties spin my pedals faster.

Larry's seat bolt comes loose. Todd feels important, carrying the tool bag to the rescue while I doubt if I bothered packing an allen wrench big enough to tighten seat bolts. The 6 mm is there. What could have crippled one bike is only a delay.

We cross a stream near two lean-to's and a horse barn. According to our map, we are not supposed to cross a stream and the shelters shouldn't be here. We



continue up the trail to see if we come to Moose Pond. I exert myself on the climb out of the valley, riding wherever the slope gives me enough yards and putting my weight behind the seat and pushing hard when I have to walk.

Todd is angry at me. He half-shouts, half-cries, "Wait, jeesum, would you wait, I want to be the leader."

Television and its born heroes! I tell him a leader is someone who is in the lead, not the one everybody else has to wait for.

Todd jumps on his Univega and speeds ahead. Larry pulls alongside me and says, "It's easier when you're up ahead, psychology. I guess."

I remember something he said the night before. We were talking about all the different rivers he and Dee had guided and I said they must be in demand with their rathing skills. Larry laughed and said, "Nothing to it, all pretty much on-the-job training. It's the human relations skills you gotta have."

Riding a ridgetop for the next hour is not easy. Black mud sucks at the wheels, tires sink in leaves, and yet Todd stays mounted and bikes farther and farther ahead. He waits for us at the next fork, an unmarked one leading across yet another stream that's not supposed to be there.

The sky darkens on the climb up the other side. We wait ten minutes for Todd to catch up. When he finally does, he shouts accusations wild with anger and frustration. Mouth shut, I wave him to the The sky darkens on the climb up the other side. We wait ten minutes for Todd to catch up. When he finally does, he shouts accusations wild with anger and

front of the group. He walks ahead, Laurel's sweatpants heavy and drooping from his waist. Underneath I see the LEE patch of his corduroys and realize he put the sweats on over his wet pants. No wonder his leos are trine!

frustration.

Larry is the one who falls behind on the next long climb. We want and wait. It begins to rain and I remind Todd he should have brought a hat. He wants to go back down with the tools and see if Larry needs help. Dee gives Todd a spare cap

with gold oak clusters on the brim. He puts it on. I salute, "Okay, commander."

Sure enough, Larry needed the ViseGrips to repair a bent pannier book. Luckoly, he'd stopped or he would have stripped the spokes. The trip is taking its toll on bikers and equipment alike.

We keep fording streams; either the map is wrong or we're lost. The bearings in Todd's bottom brocket begin to squeal and I wish I had brought some grease.

We finally come to a pond but Moose Pond is supposed to be on our left and this one's on our right. The map says another trail should intersect from the north on the other side of Moose Pond. We decide to go look. There's the trail with a sign that says, "Santanoni Preserve Parking Lot, Six Miles".

Larry says he found a lot of discrepancies on the older survey maps when he was doing his field work. "I always check with local rangers before a crew goes in."

The sun comes out again. We could average three miles an hour and still be out by dark so the rest of the trip is a relaxing ride on a trail that gets better and better. My rear derailleur is so clogged, it won't shift. Between hasseling with it and taking pictures, I fall behind.

By the time I get to the parking lot, Todd is helping Larry load bides. All smiles, he chides me for not keeping up. Laurel tells about the old hunter she and Todd passed at the base of Baldwin Mountain. He asked where they came from then shook his head and said, "A woman and a boy, all alone like thet?" Later near Santanoni Farm, they had come upon three hunters carring canness toward the parking lot. The hunters were locals; they knew the route to Coreys and couldn't believe a kid could ride it. They congratulated him for being the first they had ever seen mountain bide all the way.

The hunters reach the parking lot while Im taking a closeup of Todd and his mountain tible. One comes over, grabs Todd's hat by the visor, and yanks his head up and down, saying, "Quite a feat. You did yourself proud."

Laurel nudges me in the ribs.
"Someone else is mighty proud. You should see the grin on your face."

She and I jump into the back of the pickup for the shuttle back to the trailbead and wrap ourselves in the double bag for the trip back to Coreys. When we reach Long Lake, Todd taps on the rear window again. He points up the lake where, far out of sight, the Cold River feeds in. The trees dress the High Peaks in all their fine colors, and, yes, white clouds dapple a blue sky.

"Look at it," Laurel says, "makes you think if you could follow your eyes you'd go straight to heaven."

### Calendar

Bud Light Mammoth Cycling Classic: July 12 - 20. The Mammoth Mountain Kamikaze is a 3-stage, NORBA sanctioned mountain bike event run in conjunction with USCF road races and on and off-road tours. For more information, contact Box 970, Mammoth Lakes, CA 93546

Whistler Fat Tire Festival, July 1 - 6. This is primarily a participation event with group rides designed for all levels of riders including kids. Part of the activities is a gondola ride to the summit of the famous Whistler ski area and an exciting ride back down the ski area roads. The racing starts Saturday with a criterium race over a fivemile loop. On Sunday is the big one, a race up then back down Whistler Mountain, 4,000 vertical feet up over a seven to eight-mile course. They are classes for everyone. For more information, contact: International Event Corp. 853 United Kingdom Building, 409 Granville St. Vancouver, BC, V6C 1T2 or call the Whistler Resort in Whistler BC.

Tahoe Fat Tire Festival: July 25 · 27. Friday, July 25 is a time trail downhill at a local ski area in the morning with the North Tahoe Classic, a criterium style off-road race, in the afternoon at the NTPUD regional park at Tahoe Vista, CA. Saturday morning is a trials event while in the afternoon is the famous TNT, an eighteen-mile race from downtown Tahoe City to Truckee. The race route is unusually smooth with only one 1,000-foot climb. On Sunday is the Tahoe Roubaix, a very rugged 23-mile loop with a 2,100 foot climb. A short cut is provided for the sport class.

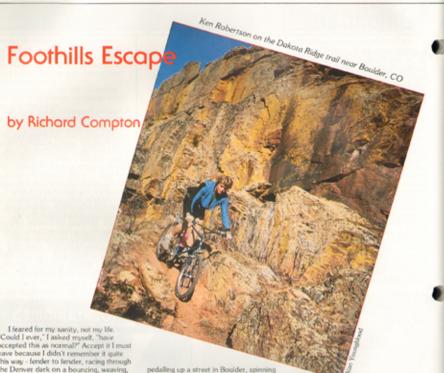
For more information, contact: Tahoe Fat Tire Festival, Box 5906, Tahoe City, CA 95730 A Sporting Proposition in Colorado has announced their schedule for 1986, three races culminating in the impressive run over Mosquito Pass, 13,000 plus feet high at the summit. August 3 is the Ft. Collins Scramble in Horsetooth Mountain Park. August 10 is the Lake Eldora Multi-miler at Lake Eldora (site of the 84 Nationals). And on August 17 is the Mosquito Pass race from Fairplay to Leadville. The race over Mosquito is one of those events that will no doubt grow every year just because people love to be able to say they raced over the highest road pass in North America. The views are stunning for those who take the time between frantic breaths to look up from the very rough route lurking in front of the their wheel, It's a classic, something people just have to do. For more information, contact: Sporting Proposition, 2888 Bluff St, Boulder, CO





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"Could I ever," I asked muself. "have accepted this as normal?" Accept it I must have because I didn't remember it quite this way - fender to fender, racing through the Denver dark on a bouncing, weaving, ill-marked highway at sixty miles per hour. "Racing" was the word. Under the conditions, I would have preferred a more sedate fifty but the flow of traffic had its own imperative. The more frantic the pace became, the more desperately I fought for a little breathing room. Accelerating, passing, dodging, looking for an open lane. It was a race straight out of Lewis Carroll no start, no finish, no rule but survival; a motley heard of beasts blindly charging to

no where. I used to make the drive from Denver to Boulder every night with equanimity, or rather with enough hostility to pass others with no regard for the denger of it. Could I ever readapt without destroying my peace of mind? I ddn't know and ddn't dare think about it. I just held onto the knowledge that locked safely in the trunk of my gallant old German sports sedan was a knobby-fired, eighteen speed, straight-barred escape vehicle. Escape from the city's stiffing pressure turned out to be closer than I thought

The following morning found me slowly

right, rising some three thousand feet above the plains. The city has rapidly expanded east, north, and south, merging into the once small towns nearby. Because of someone's foresight a few generations back, the crackerbox sprawl stops a mile short of the Flatrons, distinctive, dramatically angled 500-foot high

wintry kinks out of my legs while looking

subdivision. A single-track cut across an

empty lot then up a ridge into the heart of

quickly shook the rust out off my mind but

Boulder Mountain Park. The single-track

after 200 yards, it merged with a double

track and I settled back to enjoy the

transition from suburbia to pine forest.

Boulder sits at the mouth of two

foothills - small mountains in their own

canyons issuing from the Rocky mountain

the entrance to the Shanahan Ridge

for a trail I'd been told about. I found it at

sandstone slabs west of the housing tracts.

Some six miles long and extending up to a mile out from the base of the mountains, Boulder Mountain Park

preserves a bit of the transition from plains to mountains. In the space of a few yards, grassy hillsides give way to pine forest. The ground becomes rockier, imperceptibly steeper, then suddenly takes off at an angle too steep for wheeled passage. The Mesa Trail wanders through this environmental transition zone, from Chatauqua Park in the north to the Eldorado Springs Road in the south. The spur I was on intersected it about midway along its seven mile length.

I turned south at the intersection. Almost immediately the double-track constricted into a single-track across a ravine. I bumped cautiously down one side then pushed my bike up the other. The trail alternated between single and double-tracks, between easy riding and genuine problems (six-inch water bars blocking an already steep ascent, rock and wood steps, muddy stream crossings with stepping stones six inches apart). The difficulties weren't that long or numerous, just enough to challenge experts without

making life too miserable for tyros. The final mile was a fast cruise over a gravel road to the paved road into Eldorado Sorinss.

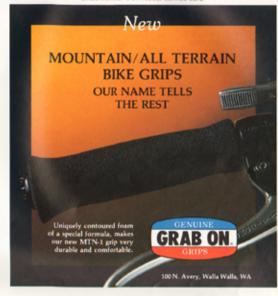
I was ready to dub it the perfect mountain biking trail but for its condition: neglected. Erosion seemed chronic but not terminal. The water bars were obviously not constructed with bike traffic in mind and I was deterred from bashing over them by the thought of knocking one over and worsening the problem. Perhaps regular use would make me more blase about the trail's state but I was a visitor in a precious reserve and held back.

Boulder is suffering from a mild dose of the Marin County Blues: the middle section of the Mesa Trail is inexplicably closed to bicycles as are all the side trails. Regular maintenance would probably satisfy all concerned parties but I saw no evidence Boulder is ready to invest in anything more than new signs. But given the trail's proximity to town and the quality of the riding. I wasn't too put out by the restraints. I returned to Boulder via Highway 93, was mentally and physically refreshed and ready to tackle my day's business. Had I had time. I could continued up Eldorado Canyon's dirt road or along the Community Ditch from Eldorado Springs south.

Later, when talking to Ed Kush and Peter Willing at Cycle Logic, I discovered the real mountain bilding action in the Boulder area is west of town in the Sugarioal/Gold Hill area a few miles up Boulder Canyon. The topography consists of steep, rounded hills with about 2,000 feet of relief. So many roads and trails lace the area that no one has had tome to ride them all. A topo map is posted on the wall at Cycle Logic with the proven routes marked in red and hot prospects in yellow.

My next stop was in Golden at Cycle Propulsion where they turned me onto the Jefferson County Open Space Park System. There are nineteen parks in the system, ranging in size from 2.5 to 3,000 acres, scattered throughout the county from suburban Lakewood and Wheatridge to 9,798 foot Berven Peak above Evergreen. At least half evidently have good biking potential. Nearby Green Mountain park was recommended so I headed there.

Green Mountain is one of the system's largest parks and one of the closest to downtown Denver. The city of Lakewood flows right up to its base on the east while Interstate 70 borders it on the north. South is open ranch land and to the west nothing but more hills. Access is from State Highway 26 (West Alameda) and Rooney Road. The entrance - a dirt road leading to a large parking lot - is clearly marked with a neat brown sign as are all the park's entrances. circle number 6 on reader service card



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As the easternmost bump of the Rocky Mountains in the immediate vicinity. Green Mountain looms rather prominently on the local horizon. The transition is startling; on one side of the street. suburban lawns and gardens; on the other. native grassland. The entire mountain is covered with wildflowers in the spring, tiny spots of gold hugging the ground. All the mountain's vegetation seems to live close to the ground with only a few thickets in the draws high enough to obstruct my sight. I wondered where the deer were hiding - their tracks were all over the trail but there was hardly enough cover to conceal a rabbit. A covote stood just off the trail as I came riding up but he quickly loped away as I angled closer. Denver seemed far away, both in time and

A network of single-tracks spiral around the mountain while some old double tracks, four-wheel drive remnants from before it became a park, head steeply up the flanks. The single-tracks are smooth and well-maintained, easy and lots of fun. The double tracks are steep and cobbly and tend to disappear into the grass periodically.

Three miles west of Green Mountain is Morrison, a funky little mountain town and tourist stop a stone's throw from the Interstate and the throbbing city yet it's completely secluded by Jow hills. Development has leapt right over it, leaving it in an eddy of dust from traffic passing through, its crusty old storekeepers waiting for time to pass and the odd customer to drop in.

Just off Sate Highway 8 west of town is Mt. Falcon Park, all that remains of the dreams of John Brisben Walker, a would-be twentieth century baron. His stone castle stood on top of a granite ridge with commanding views of mountains and plains. On a nearby ridge, he laid the foundations for the "Summer White House" where presumably he would keep his seye, and finger, on the incumbent. It all came to nought when the First World War shifted America's attention outward, his castle burned to the ground, and his Stanley Steamer Company failed to make headway against the Model T.

From Morrison, a narrow, 3.5-mile dirt road climbs 1,700 feet up the face of the mountain to the castle ruins. If a Stanley Steamer could make it, a mountain biker can too. Half a dozen shorter trails loop around the Mt. Falcon's summit west of the castle. The Parmalee Trail (1.7 miles) drops steeply down into Parmalee Gulch. loops spectacularly around the side of the canyon before returning to the ridge via a good pump. It's a beautifully groomed single-track all the way: I only had to get off for one short, gravelly uphill. The downhill was really fun, twisting through the trees with an occasional little drop-off to keep riders honest. The only drawback:



The Mesa Trail near Boulder, CO. where runners and cyclists coexist peacefully

it's over all too soon.

My last escape from the bustling city was Trail 1776, a trail a friend in Littleton raved about so much that I couldn't leave without taking a look at it. Trail 1776 is the beginning of the Colorado Trail running clear to Durango in the southwest corner of the state. Reportedly, the trail is very bikeable.

From Morrison, I went east on US 285, caught Wadsworth Boulevard south to its end at Chatsfield Reservoir, took Colorado 75 west to its end at Waterton Carryon Recreation Area.

The first six miles of riding follows a paved road along the South Platte River, whose clear green waters are a favorite among local fisherman. The road then turns up a side caryon where the river disappears under a concrete dam. A half mile more of dirt road then the trail proper begins - a soft, smooth simple track following an old mining road switchbacking up the side of a pine covered rides.

It took me a little under half an hour to reach the top-not the high point of the trail but the end of unremitting labor. But for a little sand at the end of the road and some tricky cornering on the switchbacks. the riding was a long, pleasant pull looking for the sunlight at the top. From there, the trail rolls on around the sides of canyons and over ridge tops for nearly forty miles before crossing another highway, ideal for cycle touring.

I hit the homeward road at dusk; mellowed out, funed up, and well pleased with myself. I'd spent three days in the city taking care of business yet my mind was filled with images of green fields and endless pine forests. City streets were counter-pointed by dirt roads, the harsh sounds of traffic by the crunch of gravel, Most important, my mind had kept its edge throughout the hours spend dodging a lifestyle I'd left some time ago. I'd packed my bike along with only a vague hope of finding some escape from the city. I'd had no idea just how completely that escape was to be consummated. From now on, my fat tired flyer is now as much a part of taking care of business as my briefcase.

For information on Jefferson County Open Spaces: Jefferson County Open Space department, 1801 19th St, Golden, Co, 80401, For Trail 1776: Colorado Montain Club, 2530 West Alameda, Denver, CO.

### The Forest's High Shore and Beyond

### Story and photos by Frank Staub

Your head's bent low over the handlebars, sweat's running into your eves, and upp can't hear a thing over the rasping of your lunes trying desperately to wring more oxygen out of each breath. You're struggling up a trail deep in Colorado's Rockies, well above timber line, and just when you're ready to quit, to get off and stagger around in painful circles while you try to slow down your racing heart and breathe without sounding like a drowning swimmer and maybe even to stop the throbbing in your head, you peer ahead and spot what looks like the top. The sight's enough to inspire you into crouching down and pressing on, just to see if you can make it.

The soil beneath your tires passes by unseen. It's all you can do to just stay up on the bike much less look around. But if you did, what you'd see would probably appear a barren scape of rocks sheathed with a tenuous membrane of soil, incapable of sustaining life or certainly not something to hold your interest. You struggled this far for views of glacier carved valleys far below and jagged peaks soaring into the azure sky, not to look at vegetation. Besides, the flowers are lower where there is at least some semblance of a normal climate, not here where even on this summer day a cold wind sweeps across the slopes

Above timber line lurks one of the harshest climates on earth, one where 100-mile an hour winds regularly builtet the land, where summer night temperatures can drop to below freezing while ground temperatures during the day can hear to as high as 120 degrees Fahrenheit, where the growing season lasts a meager eight weeks and the land lies snow-covered the rest of the time. But the perception that the land is barren is totally false. On the contrary, it's a vertible cornucopia of visual and olfactory riches for those willing to strip their eyes away from the surrounding mountain spectacle and look around.

Timber line is where the forest finally



Rhya Verplank heading up into Colorado's alpine tundra

loses its war against the elements. It isn't as straight as say a contour line; instead it oscillates across the slopes according to soil, wind, sunlight, and winter temperature. But despite those local variations, timber line maintains a relatively constant level for any given latitude. The closer you are to the poles, the lower you'll find timber line. In the

western hemisphere, tree line ranges from about 13,000 feet at the equator to about 12,000 feet in southern Colorado to about 7,500 feet in Montana while in northern Alaska tree growth is impossible even at

Turbulent air flowing across mountain slopes gnaws at the forest like a stormy sea lashing a continent's borders. And just



by elfin groves of wind-wracked trees known as krummholz, a German word meaning crooked wood. By staying short, the krummholz minimizes the wind's force while simultaneously taking advantage of winter's protective blanket of snow. An individual tree that for some reason outgrows the rest of the grove and stands out like a professional basketball player in an airport lobby is known as a flag tree. Its branches are bent in the prevailing wind's direction, hence its name.

The wind's direction can also be indicated by entire patches of krummholz growing as a giant, unified wedge pointing into the wind. The first trees hit by the winds are severely stunted but by the time the wind reaches the far side of the grove, it's calmed down, enabling trees to grow

Isolated trees growing prostate along

breaking rocks. Ironically, the seeds may have been transported by the future tree's worst enemy, the wind. Those pioneering trees in turn may serve as windbreaks for still more enterprising seedlings until in a few hundred years, an island of krummholz thrives where once only isolated trees clung to the harsh terrain. Most krummholz trees lead a life of forced sterility. The tender shoots that spawn procreating pollen and ova generally develop on the highest branches' tips and consequently are usually winter-killed.

If, once you've caught your breath after attaining the pass, you look around and imagine the scene before you must be what the Arctic looks like, you're right. That's why it's called alpine tundra. Winters above timber line are at their unmerciful worst, discouraging even the most stalwart spruces and pines with its

North. In fact, sixty-five species found above tree line in the Rockies also grow north of the Arctic Circle.

Summer's tundra resembles a patchwork of lawn-like fields, marshy meadows, and desert-dry slopes with only an occasional snowfield as winter's reminder. The sight of fields of greens. blues, pinks, and oranges scattered like throw rugs across the tundra astounds first-time visitors to this land beyond the

But it's not the flowers they first notice on a clear day; it's the incredible brilliance. The air is super charged with light. At 10,000 feet, 25% more solar radiation reaches the Earth's surface than at sea. level. Because ultraviolet and infrared wavelengths are also more abundant, tundra plants have evolved protective devices against the cell-damaging

maximize the plants' survival chances with shades that are generally darker for maximum heat absorption.

But color is just one of the ways alpine plants have adapted to the cold. Many carry on photosynthesis at temperatures in the thirties while lowland species rarely function at anything less than forty or fifty degrees Fahrenheit. Some tundra species even possess a high concentration of dissolved substances in their fluids that act as cellular antifreeze. Plants also grow close to the ground where, because of friction, the wind has less force but that shortness isn't caused by the wind directly. It is, rather, an inborn trait passed from generation to generation even when the plants are artificially grown at low elevations. If that weren't the case, a freak span of warm weather might fool a tundra herb into shooting recklessly upward to be relative in the valleys and foothills. For example, the alpine sunflower's head maintains the sunflower's typically huge size yet its stem is rarely more than six inches high. Its leaves and stems are covered with short, hollow hairs to help retain the sun's warmth while blocking dangerous ultraviolet radiation. That covering of short hairs is common to quite a few alpine species.

The pubescence may also assist in blocking evaporative water loss. In spite of ample precipitation in the high country, parts of the tundra are excessively dry due to wind, sun, and rapid run-off. Welldeveloped root systems for maximum water absorption are common adaptations for such conditions. The cushion-like growth of plants like the alpine forget-menot and moss campion block the drying winds while serving as effective heat traps.

Because temperatures can be many degrees warmer within one of these plant cushions, insects are frequently found there seeking refuge from the cold, a bug's equivalent to Cancun.

Possibly the most serious obstacle to plant survival in the aloine zone is the abbreviated growing season. Spring begins in June while the first signs of autumn can come as early as mid-August, hardly enough time for annuals to develop from seed to flower. Consequently almost every tundra species is a perennial. Their growth is slow - no more than a third of an inch. every ten years in some cases with as much as 20 years before the first flowering. (Few bouquets are more varied in color and shape of blossom than those gathered from alpine hillsides but because of that time required to replace what was picked, it's an extravagance nature can't afford. Take only pictures is the hard and fast rule of tundra travel.)

Despite an obvious toughness that enables vegetation to thrive in one of the world's harshest environments, it's also highly susceptible to environmental damage. The consequences of innocently cycling across that wonderfully green meadow spread across the pass before you are more serious than in possibly any other habitat. Between the short growing season and thin soil, generations can pass before enough organic matter has decayed and accumulated to support roots. Consequently, erosion scars can last for centuries.

Threats to the tundra are increasing because of ever greater numbers of hikers. horsemen, motorcyclists, four-wheelers. and now fat tire cyclists venturing above timber line. Of the group, hikers and mountain bikers have far and away the least impact. And while a bicycle's fat tires roll over the grasses as softly as a moccasined foot, it's still vitally important

### Mountain Life Zones

One of the interesting highlights of a long ride up almountain is watching the passing changes in plant life caused by a progressively confer climate. Air temperature drops about three to five degrees Fahrenheit for every one thousand feet. This can be a detriment and an advantage for plants. The soil at higher altitudes is usually moister because cool air can't hold as much water vapor as warm air. The result is rain and snow. But each elevation gain also shortens the growing season with a corresponding risk of frost damage. Thus, moisture loving old tolerant species tend to grow on

and plants according to altitude is so byjous that biologists refer to each major. association of species as a life zone. For the life zones and their approximate

Pialris Zone (up to about 6,000 feet) Dry grasslands with occasional shrubs. Few trees except along water courses. Footballs Zone (6,000 to 8,000 feet) Open forests of Ponderosa pines on sunny, dry, south facing slopes and

Douglas fir in moister locations such as emoded north facing slopes, intermixed with extensive open areas of grass and shrubs. Egnests of pinyon and juniper dominate the driest foothills

Montane Zone (8,000 to 10,000 feet) .-Forests of Ponderosa pine and Douglas fir occur in the lower limits and are denser than in the footh Tis. Englemann Spruce, limber pine, bristlecone pine, and subalpine fir in the upper limits. Also, stands of aspen and lodgepole pine develop after forest fires or in areas of past. d sturbance.

Subalgine Zone (19,000 to 11,500 feet) Dense, moist forests of englemann senuce. nd subaltime fir with lodgepole pine and aspen at lower limits and imber and bristlecone pine at upper limits and along

Alpine Zone (above 11,500 feet) - Nofree growth due to severe cold, high winds: and a very short growing season. Mostly low shrubs and perennial herbs,

The plant groupings on any mountain of significant height will vary in a similar way, In New Hampshire's White Mountains, the life zones are:

Northern Hardwood Forest (up to about 2,500 feet) - Beech, soon maple, yellow bitch. - 100

to respect this fragile world and act

accordingly

Because of your bike's silent passage. don't be surprised if a blur of gray and white suddenly bursts into motion from practically under your tire. This has happened to me innumerable times yet it never fails to startle me out of my seat. What sometimes seems just another platesized chunk of tundra in reality is a whitetailed ptarmigan, a well-camouflaged kin of the grouse. The ptarmigan is the only bird, and one of the few creatures, who survives above tree line year round. It's also one of the tamest wild animals on the continent. Like their cousins the pheasants, ptarmigan generally flee only when they are nearly stepped on. But instead of flying out of sight, ptarmigan simply waddle off a short distance and resume nibbling on the dwarf willows.

Two more year round tundra citizens are the highly audible if not always visible marmot and pika. The marmot is the larger of the two with a round, furry body resembling that of its close relative the woodchuck. Marmots hibernate through the winter but during the summer are seen

Transition Forest (2,500 to 3,500 feet) Upper limits of hobblehush and mountain

Boreal Forest (4,700 to 5,200 feet), red pruce, fir, paper birch, and mountain ash Alpine Zone (above 5,200 feet) heaths, dwarf willow and birch, black

speuce, etc.

Don't let these classifications fool your into thinking the correlation between plant." life and altitude is always consistent; it isn't. In the Rockies, patches of the treeless plains may exist in dry, sunlit areas above 6,000 feef. Likewise, trees common to the high mountains are often found in moist bottom lands of the lower foothills. Slope direction and other factors affecting the micro climate and soil conditions play important roles in

determining which plants grow where

With a basic knowledge of each cone's vegetation, you can with some degree of confidence estimate your elevation during a ride. But even if you guess wrong, you'll still have a much richer day's ride for having paid attention to the environment you passed through. That intimacy with nature is one of the things that makes mountain bilding so unique from road biving. When road riding, you can tell if you're in the city, suburbs, or country by studying the architecture and the quantity. of last food outlets living the hickway. Offroad, just study the trees and you'll know about where you are.

perched on boulders and issuing the high pitched calls that earned them the name whistle pig". The tiny pika's call is more on the order of a squeak than the marmot's whistle. Pikas belong to the rabbit clan and, like the ptarmigan, remain awake through winter beneath the rocks and snow. They spend the summer racing across the rocks gathering plants which they spread out to dry for their winter food source.

The high country's remoteness has made it a natural haven for the shy and sensitive bighorn sheep. Once common all the way down to the plains, the bighorns' understandable intolerance for civilization forced them to the mountains' crassy heights. Had they not done so, they might well have become extinct; the appeal of a ram's massive curled horns hanging above a neon beer sign on a den wall might have wiped them out had they remained more accessible

Mountain goats, on the other hand, have always resided almost solely in the alpine zone. Only during the coldest months are their shaggy white coats and black spike horns seen at lower altitudes and even then they seldom venture more than a few hundred feet below tree line. That remoteness helps explain why mountain goats have never been severely depleted by hunters.

The mountain goat and the bighorn sheep are some of the most difficult animals to spot. Their keen evesight almost guarantees they spot you before you see them. But by silently and swiftly cycling over a trail along a wind-swept ridge above timber line. I've seen more of these elusive animals than ever before. I sweep around a corner into an expansive basin and suddenly, there they are, white dots peacefully grazing on a deep green hillside. I whip out my binoculars and treat myself to a sight few ever see. For some reason, they don't yet seem to immediately associate a biker with people and I often have time to carefully sit down on a sun-bathed rock in the middle of a field of tiny wild flowers and leisurely watch them feeding. I lean back, the aroma of flowers wafting around me, a slight hum of busy insects in the background, and soak up the sun and view. It's times like that when no matter how great the effort was, I know getting beyond the trees was worthwhile.

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#### The Serac Training System.

Here's another line of cycling clothing we'd heard nothing about until they arrived in a box one day. Serec is familiar to us through the ski industry but evidently they're branching out into multiple sports. The Training Suit is a fine cruss over one of aihletic clothing. You an slo, run, cycle, whatever in it and shales have just the lover upu need for hat day's conditions.

The system includes, tights, cycling horts, baggy shorts, sweat pants, water, resistant wind parits, poll-over sweater, ip up shelled jacket, even a t-shirt and

Our favorite of all were the tights They're 90% polypropylene, 10% lycra and ook and feel creat. Despite the increasing opularity of tights whenever the emperature is a bit on the cool side, they really don't do much to keep you arw warmer. Lycra is not much of an insulator. fortly they provide psychological warmth. but these tights really did work. Leven waded through wet spring snow when wearing the tights and didn't even notice the cold. I've also bounced across creeks on a cold morning, water spraying up off the tires while my pedals splashed through, and once again my less stayed. wonderfully warm. They seem like they f even fighter than a person's skin per are so comfortable, everyone who tried themout would forget they were even ont.

On really cold mornings, we'd put on the tights then over them the polypropylene sweatpeats. A appeared a lacitated putting them on and kept the out of the chain. The combination of these two layers was warm enough for almost conditions but if a wind was blowing or the air was dame, then we'd just pur on the shell pents and that took care of that. Th riothing I ved up to every claim Serac

That goes for the sweater, sacket, cycling shorts, and nylon bagg, shorts too. We also used the clothing spring skiing. with equally happy results. You can buy the pieces individually of the complete system. If none of your local cycling shops have ever heard of Serac, try the skill shops. They can probably help you.

Transalp is a small company out of Boulder, Colorado, owned by Bob Culp, a name anyone who a been into rock climbing over the past (went) years or so will immediately recognize, and managed by Duncan Ferguson, another well known climbing same. Their specialty is understandably mount a neering oriented clothing but they're also versatile athletes. who do a lot of things besides climb tooks. Duncan's been a friend for years besides being an avid mountain buser. He knew their new line of clothing would be just the ticket for us and he was right. It's great

Transalp's Climbing Skins are made from a unique new faoric, a 4-way stratch polyproflycra blend brushed on the inside. It's slightly thicker than expedition weight. underwear, amazingly warm and wind resistant. Yet its comfort range is surprisingly wide. It's the perfect layer to wear when you head off in the morning for a long riderinto the mountains and the air's still pretty cool. Cold air is especially hard. on kneek so these pants are a real prize. for someone who's had any knee problems. They keep you so warm you'll completely forget about what the emperature is. Even when the morning

tots up. The labric's ability to wick away all pisture kept us comfortable long after were well into the day. Querheating as never a problem. We really don't know why this was so but it was. That doesn't mean you'll want to warm them when the mercury is up around 70 decrees though you could. But up into the fifties. and low sixties, the clothes are superb-They I also keep you warm even if you'reraught out in a rain and get souled) fi the rain then stops, by the time you get back, hey'll probably be warm.

The 4-way stretch means a great fit. hey're like having a second skin. Zppered opffs make putting them on and off a snap while an elastic waist with draw cord keeps them comfortably up. Not only do they feel great, they look great too.

This is one product we won't be state in suggesting your check it out for you'relf. Now that wave from wearing them for awhile we don't know what we do! suiteed them. They should be great for

Styles are pants, knickers, long pants with sieeveless bill, long parits with a mesh bib, pull on guide sweater, and arp up ackets (one with a breathable, highly water-resistant shell over the front, one without). The long pants with bib are too but for enything but cold weather cycling but with the mash bip, they're fine. They also have tights that are 90% polypro and 10% lycra. They're definitely a heavier fabric than the usual right and so far seem. practically indestructible.

For more information and a catalogue write: Transalp, 1335 Broadway, Boulder,

#### Emdy-K

A recent entrant into the world of off oad clothes is Emile K. Their design consultant is none other than Aaron Cox, former member of the Ross mountain take race team. His influence shows. Their lycra shorts have pads down the sides to help reduce the damage when you crash and land on your tip. No one was willing. o take a deliberate cresh to test their fficiency out but everyone agreed the

dea was a good one. Their mesh jersey also has a padded ght shoulder. That's for carrying a bike. Obviously this will benefit eight-handers more than left-handers unless they come with either version. This we did try out and yes it aid work. Carrying the bike was more comfortable than without it but it shill wasn't something any one wanted to do ny more of than they absolutely had to

Workmanship was excessent, the cothing was comfortable, and most importantly, it was practical. The last is no doubt due to Aaron's influence. We're uking forward to see what other mountain biking several clother Emily K

Cannondale does more than just build minum Eikes. They also have a continually expending clothing line, We've fried out their lycea rights and shorts: 3. polypropylear zip-neck shift, and rain suit

In althorestly, there's not a lot of difference between one pair of lucra shorts or tights and another. Cannondale's are well made, in well, and looked acod. We especially liked the color of the green rights. Sharp polor.

The polypropolene shirt was another story. It was great. We wore it in a lot of conditions and were always comfortable including riding for miles in wet, cold conditions. The zip neck provided some ventilation though at times we'd wished for a longer apper. Even after pour cing up a long hill, we never really overheated and the short remained pretty dry. Now, a colthey'd come out with a polypro t-shirt to-

go along with the long sleeved, zip-reck. Cannondale's rain gear got plenty of testing in California. I was working on the Marin story for the May/June is see and it seemed like it did nothing but rain all the time. That's an exaggeration but that's what it seemed like at times. So the clothing got plenty of mileage and it

Tife top pulls on and has a hood with a and a strap that lets the rider adjust how far down over the face the b sangs. Combined with a collar that came up over the chin, keeping the face dry oven in pour se rain was pertagreasy. The material was water-proof too.

The pants had plenty of room for omfortable cycling and pulling them on own shoes. A velore strap then shut the I down so nothing could be caught in a bike. Like the top, the gament did the on it was intended for.

Black Bottoms is not another. ecialty company procothing. Their most innovertee an teresting garment is a pair of bib fight hose fract side is made out of tretchable Bion II, a breathable waterproof material. The tights are: atomically out for a comprisable town eding. They're definitely but as comfortable when standing up though he bib only covers the front, leaving the back exposed to the waist for a suntan. Most women will probably profer wearing a light shirt under it since more than just back will be exposed when bent over

be tights were comfortable and, as far s are one was able to tell considering the inditions they were worn under, reathable enough that there was no dispernible build up of moisture. They oked great too. Really fast and slinky.

The lycra shorts we tested were natomically cut with six pane's and a ontrasting side strip. As we've said efore, they're really isn't much to say bout lycra shorts except that they were comfortable and well made. The only comment we heard, and this was not universal, was that shorter legs would me been preferred. Mountain bikers don't seem to be into the longer legged

rese are only two out of a full line of clothing. For more information, contact is Black Bottoms, PO Box 7104, Salt Lake City, UT, 84107:

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systead of the bike shop. But not always, North Face gear in a bike shop. But it's a normal realm of mountaineering shops. It's might run into some presty part year open and mountaineering shops. It's might run into some presty near year. We no longer unusual to find Patagonia or

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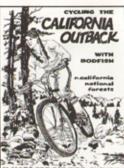
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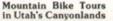
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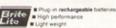
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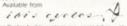
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### **Events**

Canyonlands Fat Tire Bike Festival

Wrap up the biking season with style in Moab, Utah during Canyonlands Fat Tire Festival from October 26 through November 1. Organized by Rim Cyclery in Moab and Mountain Bike Magazine, this celebration of mountain biking promised to turn into a classic event, one you won't want to miss out on if you love adventure cycling.

The riding around Moab is justifiably famous: there's nothing like it anywhere else in the country. From the one and only Slickrock Trail to the White Rim Trail, the canyon country has it all. Shuttles and guides will be heading out daily for the countless rides, ranging from easy to sustained challenge, surrounding Moab.

This is not an introductory course on mountain biking. Most of the guided rides will be difficult enough that some experience riding off-road is recommended. Not that beginners aren't welcome: they are. But the Canyonlands Fat Tire Festival is a time to celebrate all that makes mountain biking the great sport that it is and as such, events will be geared for experienced mountain bikers. In fact, the festival is built around getting out and riding.

But there's more to Moab than just mountain biking. Adjacent to town are Arches and Canyonlands National Parks while soaring overhead are the 12,000 foot Manti La Sal Mountains. The Colorado River runs right by town. South of town is the confluence of the Green and Colorado Rivers and downstream from there is Cataract Canyon, Rafting options will be available for those interested in seeing the canuons from John Wesley Powell's perspective. Riders can select one ride where the morning will be spent cycling deep into the canyon to a point where they'll be picked up by a jet boat for the return to Moab

Petroelyphs and Indian ruins are found wherever you travel in the canyon country and should be left undisturbed. So to help riders experience this fascinating aspect of this land's history, at least one tour to ruins is planned though not yet finalized. There are also tentative plans for a tour for those interested in the land's formation. The forces that formed the land are so dramatically exposed in Utah that it presents a unique opportunity to gain some understanding to spaceship Earth's history. Staring out over the vast distances at the bare rock, you can practically feel the earth shifting and adjusting itself to unseen powers, to hear infinity.

If you're a rock climber, bring along your equipment. Routes range from the Fisher Towers to excellent boulders near town. And definitely include your camera. If you don't, you'll just have to return the following year to get the pictures you missed this year. And if you have a road bike, bring that along too. The road riding is excellent. And definitely bring along a headlamp system if you have one.

A Time Trial over the Slickrock Trail with classes for everyone, slow and fast, is also on the agenda. This is one event you'll probably find yourself describing all through the winter to come. It's not finalized yet but if everything works out, there'll also be an opportunity to test ride a number of high performance bikes the likes of which you may never have seen

If you haven't figured it out already, the Festival coincides with Halloween and yes. there's going to be a party so come prepared to get down and party. Just eave all the seriousness behind. This is the week to celebrate how much fun mountain bikes really are. The Canuonlands Fat Tire Festival could turn out to be the event of the season; don't

For more information, contact Rim Cyclery, 94 W 1st North, Moab, UT, 801/259-5333

Mountain Bike Magazine's Colorado Grand Tour

Warning! The following is only for riders interested in experiencing some of Colorado's finest cycling. Days will be long, the riding sustained, and the scenery spectacular. It's not a race; it's a tour through the heart of southwestern Colorado's mountains.

Riders will meet in Crested Butte on Saturday, August 16 and will then be transported to the Purgatory ski resort near Durango. On Sunday, your gear will be driven around the mountains to Telluride. Any riders interested in doing so will then ride through the mountains, arriving in Telluride that afternoon. The following day, Monday, equipment will be hauled to Silverton while interested riders will ride over Ophir Pass to Silverton. Your gear will then be driven to Lake City on Tuesday while groups of riders may if they so decide cycle over yet another high pass. From Lake City, gear will be hauled to Gunnison while any riders who choose to do so will cycle via rolling hills to

Gunnison, arriving Wednesday afternoon, August 20. Thursday morning, equipment will be hauled to Aspen while riders who so choose will ride to Aspen via Taylor Pass, dropping into Aspen right down the ski area road to downtown Aspen. Then on Friday, August 15, while the equipment is hauled back to Crested Butte, any riders who want to will once again traverse the Elk Mountains, arriving in town that afternoon, August 22.

Meanwhile in Crested Butte, the Munsingwear Classic will be getting underway on August 20. The Munsingwear Classic is the last major race before the worlds in Colorado Springs and as such, is particularly important for results will affect who is selected for the US Amateur Team. Additionally, quite a few foreign teams will be using the race as a final tune-up for the Worlds, including the powerful Russian and East German teams. This promises to be one of the most exciting races in the country. Because of Crested Butte's distance from major population centers, the courses won't be overrun with spectators. The

courses are exciting and offer excellent spectating opportunities. It's safe to say that rarely is there ever such a great opportunity to so intimately watch this level of racing. The top amateur racers in the world will be going hard and heavy literally only an arm's length from spectators. The Munsingwear Classic will be the perfect wrap-up to a week of great

Each stage of the tour will be long and sustained. Participants should be in good shape, prepared to ride over high passes on roads ranging from smooth, packed gravel to rough four-wheel drive. Riders will also be on their own. The only service we're offering is to haul your gear around to the next town. How you ultimately arrive there is up to you though quite obviously groups of riders will be riding together through the mountains from one town to the next. Tool kits and lunches will be available for those who want them Plenty of water is also strongly recommended - a minimum of two large bottles. Bodabelt water containers will be available for those who want them.

continued from pg 65

There's no telling what the weather will be like so riders should prepare accordingly. Hail or snow can fall any month of the year in Colorado though wis unusual in August. Accommodations in each town will be in lodges or you can camp out if you prefer. Breakfast and dinner will be served in restaurants though again you can camp out if you prefer. Meals will be paid for by each rider individually. But we are arranging discounted lodging and meals for interested participants. Quite frankly, the plan for most of us who are planning on riding is to do this up in style. We're looking for a great time, super riding followed up with delicious meals in restaurants and comfortable nights in

Our purpose is to provide a wonderful mountain touring experience with minimal hassle and cost and without having to lug

along lots of equipment on bikes. Riders can travel light and fast from town to town. Because this is not an organized tour -all we're doing is providing equipment transportation from town to town - there will be no insurance and consequently no insurance requirements. The use of helmets will therefore be up to

Numbers will be limited so contact us as soon as possible if interested. The Mountain Bike Magazine Colorado Grand Tour promises to be a unique and inspiring week of mountain biking along the backbone of the Rocky Mountains followed with the opportunity to watch some of the world's top riders go head to

For more information, write Mountain Bike Magazine, Box 989, Crested Butte, CO. 81224

Fat Tire Bike Week, Crested Butte

Fat Tire Bike Week is once again happening the week of September 14 through the 20th. This is mountain biking's annual set together in the middle of what many consider the finest mountain biking in the country. As usual, a number of events are scheduled but mostly it's a time for old friends to gather, exchange tales, and experience the incredible singletracking Crested Butte offers. The aspens are turning into seas of quaking gold washing over the mountains' slopes while fresh dustings of snow may sparkle on the surrounding summits. Fall in the mountains is always a time of sublime beauty and there's no better place to feel that than in Crested Butte.

For more information, contact: Murdock, Crested Butte, CO, 81224

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### **New Products**



Rump Riders, Product Review - Daniel

Fanny packs are a logical solution to a mountain biker's need to haul small loads. Unfortunately, many readily available fanny packs are small, poorly constructed, nylon sacs that bounce excessively and can even fall off. One exception to that rule is the Rump Rider by Jrat Designs.

The Rump Rider is designed for mountain biking, mountain running, or any other strenuous activity. I have earnestly attempted to abuse the large (700 cubicinch capacity) Rump Rider during extended runs and rides through the

mountains. The pack came though the worst I could subject it to with no problems.

Ballistic nylon is double stitched then equipped with a bomb-proof outer zipper. an inside zippered pocket, tie on straps, a padded pack pad (removable), a compression strap, and a padded and contoured hip belt. Polypropylene sheathed in nylon mesh wicks sweat away from hips and back.

Prices vary with size (small or large), material (cordura or ballistic nylon), and extras (foam pad and polypropylene).

Jrat Designs, 1833 Pearl Street, Boulder CO, 80302

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### **New Products**



Bodabelt

Every once in a while, some product arrives in our office that really hits the spot. The Bodabelt is one of those.

The Bodabelt is a plastic bladder inside a nylon case that attaches around your waist. The bladder holds about one litre of water (or liquid). It was originally designed for long distant runners in 1976 and has been used by mountain runners ever since. Competitors in the Western States 100 have been wearing two or three around their waists for years.

Mountain bikers are now starting to use them too. Why? Because the water bottles on your bike sometimes don't hold enough water for the trip you have in mind. Or maybe you're planning on cycling to the base of some mountain you'll then hike up. You don't want to take along a pack, and don't really relish the idea of walking with a water bottle in your hand but you know you'll need water. The Bodabelt is the perfect solution.

We've been using the Bodabelt every time we take a test bike out. Test bikes never have water bottle cages. Now, instead of hassling with constantly switching cages around, we just warp a Bodabelt or two around our whists and we're off. They're so comfortable that we never even notice them. We've even worn three of them at once on long rides. Their only drawback is having to take it off for a drink. But we're usually ready for a break anyway so it's really no big deal. We once even used two of them as back relaxers. We filled them with hot water, put them on over the small of the back, then lay down and covered them with a couple of sweaters. Worked great.

One of the best things about these was carriers is their versatility. We can see using them for nordic skiing, back country skiing, mountain running, day hiking, climbing, fly fishing, board saling; there's almost no limit to their uses. If your local bike, mountaineering, or running shop deem't carry them, contact Bodabelt, PO Box 256, Boulder Creek,

They also produce two farmy packs, a 100 miler and a 50 miler, that we've also found to be excellent. Sometimes instead of wearing a Bodabelt, we just pack a lunch in the fanny pack along with a couple of bladders full of water and wear that instead. That works great too. There's also a small pocket that attaches onto the Bodabelt that's just the right size for a small tool let and patch kit. You can even put up to three of them on one Bodabelt.

Avocet Slicks

We've discovered the ultimate tire for the Silickrock Trail near Moab, Utah: the Avocet Silick. It's really meant for the city and it's excellent for that, But we just thought we'd go ahead and try it out on the Silickrock Trail while we were out there testing bikes. Hey, these things are uncanny. They're the equivalent to a climber's specialized rock shoes. They stuck like glue. The confidence they gave us once we realized they really weren't going to slip out was astounding. None of us had ever ridden the trail so fast.

To try them out, I put them on the Team Ritchey. The bike itself was no slouch by any stretch of the imagination but those tires really let it fly. We ran about 35 or 40 pounds of air (we didn't measure it; just let a bunch of air until it felt right). We wanted enough air to keep from bashing the rims yet keeping them soft for maximum traction.

The Ritchey's granny ring was a 28tooth round ring, normally too small for many of the climbs, at least for most of us. But those tires were so grippy we could just stand up and pound those pedals with no fear of any loss of traction. Surprisingly enough, the tires were excellent in the few patches of sand along the trail. We expected to come to spinning halt in it but instead, they just floateed right through. Then when we made the transition from sand back onto rock, right where we normally futilely spin because of sand still clinging to the tire plus a dusting of sand on the rock, the Avocets just dug in and shot us forward. Never did they hesitate. The tires were flat uncanny and from now on, whenever we head for Moab, we'll make sure to have an extra set of wheels set up with Avocet Slicks.

We want to anyway for those times when we nide the highway. Pump them up to 80 or 90 pounds of pressure and you can fly on the street while still having the cushion fat tires normally provides the Whether the Specialized 1.5 Nimbus tires or the Avocet Fat Slicks are faster is a moot point. Reportedly the narrower tires are faster because of their lighter weight and smaller cross-section but both enable mountain bikes to hit speeds on pavement that amaze many a roadie. What we did like about the Avocets was their soft ride.

They're really fun around town. But,

role in life is to provide unlimited good

seriously, that's only a diversion. Their real

times on the slick rock. But you'll have to

try it yourself to find out just how much

fun they are.

**New Products** 





Mini Tool Kit

Heading into the backcountry by bike without a tool kit is irresponsible at best. Unlike road bikers, you can't just hitch a ride back into town if something breaks. You have got to be self-sufficient.

Well, here's a tool kit that may just be the ticket for you. It's not as complete as many a mountain biker carries but as a minimum tool kit, it's just fine. What's particularly impressive about it is the size. Most of the kit fits inside a Rema bike tube patch kit box! Yes, that's right, inside one of those small blue, plastic patch kit boxes.

What you'll find inside are a Rivolichain breaker, straight blade and phillips head screw drivers, three alien wrenches, patches, sander, and glue. The Rema box then goes misde a small Talwind saddle pouch where you'll find a four-inch crescent wrench modified so it will open wide enough for axle nuts plus three plastic tire irons. There's also a direction sheet for the rivet extractor and directions on how to pack everything back into the Rema box plus a spare pin for the chain breaker. All of the tools have been machined and modified specially for this tool kit, including the chain breaker. While admittedly this is a minimum tool kit, it's still more than what most people carry and it will take care of almost every common bike problem. The only other tools we added to the kit were a spoke wrench and a pair of pliers. It's small size and minimal weight should insure no one will ever leave it behind. For that reason alone, this may be one of the best buys on the market. And if you have a Bodabelt, the kit fits right into one of the small pockets you attach to the helt

For more information, contact Mountain Gear, Box 175, King's Beach, CA, 95719.

Alsop Chain Cleaner and Lubricant

Alsop has come out with a slick chain cleaning tool that's small and light enough f to pack along on multi-day adventures in the beckcountry. What you do is slig the brushes over the chain then while turning the pedal, periodically spray their combination cleanser/fubricant. There's

no need to press the button down and hold it down. Periodic squirts do the job. The spray will last much longer too.

The cleanser dissolves built up crud but not the wax lubricant. What Alsop has managed to do is combine the old time wax lubricating system with a cleanser and stuck if all inside an aerosol container. It's handy and effective. But we sure would like to see it in a non-spray version, Just

seems like dripping the lubricant on is far less wasteful. Nevertheless, Alsop's system works and we use it regularly. Being able to clean the chain so quickly and easily is a real treat, especially when we're way out in the mountains and just spend hours splashing through mud. A little washing with water to get the bulk of mud off then finishing it up with the cleaner and we're ready for more.

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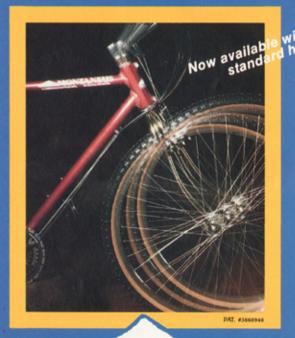
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