



# Frame and fortune

This is complete history of Bimota, the Italian company that showed the Japanese how to build frames and influenced a generation of engineers

Standing in the gravel trap at the Curva della Quercia at Misano in 1972, a battered Massimo Tamburini made a decision that would shape the future of motorcycling. Next to him was the reason he nursing three broken ribs – his Honda 750 Four race bike. Tamburini came to a simple conclusion that the Honda's frame wasn't up to the job of dealing with its horsepower. There was only one solution, he decided to build his own frame and swingarm. In this moment the Bimota we know was born.

Bimota, the company, was actually formed in 1966, specialising in heating systems. The original founders were Valerio Bianchi, Giuseppe Morri and Massimo Tamburini with the first two letters of their surnames creating the company's name – BiMoTa (good job it wasn't their first names – Ed). Tamburini was the bike nut and in his spare time he turned his engineering skills into creating one-off 'specials.' It wasn't long before Tamburini had built a strong reputation within the world of motorcycle design and a decision was made in 1972 to split the company into two divisions.

Tamburini set about producing a frame and swingarm that could deal with the Honda's horsepower. The Japanese were making enormous advances in engine design, but were woefully lacking when it came to chassis stiffness. Tamburini realised the strength that a tubular construction could achieve and used this when designing his new frame and

designed it so the engine was an integral part of the chassis to make it even stiffer. Tamburini called his new creation the Honda-Bimota and it wasn't long before it sparked interest.

With orders on the books for the new frame, Bimota opened its first factory in 1973 in Rimini. Initially the factory only occupied a space of 100 square metres and employed a single worker (Dervis Macrelli), however by 1975 Bimota was forced to move to a nearby factory ten times bigger to satisfy the rapidly increasing orders.

At this time Bimota motorcycles were only available as kits because the fledgling company didn't have the clout to buy engines directly from the Japanese, a situation that continued until the launch of the KB1 in 1978, the firm's first production motorcycle. Bimota was now more than just a parts producer, it was a full blown motorcycle manufacturer.

Launched at the Milan Motorshow in 1977, the KB1 not only looked stunning, it proved the perfect platform to showcase Bimota's skills. Taking a Kawasaki Z900 (and later the Z1) as a base, Bimota managed to chop a staggering 40 kilos off the Kawasaki, vastly improving its handling and boosting its top speed by over 10mph. The bike proved a huge success for Bimota; 827 KB1s were produced of which 16 were sold complete. Bikes were still known by their code names, using the first letter of the engine supplier's name followed by a B for Bimota then a number representing ▶



## HB1 (1974-1975)

The first Bimota was only marketed as a frame kit that consisted of frame, swingarm, wheels, suspension, tank, exhaust and fairing. All that was required then was the Honda CB750 engine. The kit costs 1.8 million Lire and only ten were ever made, making it the rarest of all Bimotas. The frame was made from chrome molybdenum tubes (the same stuff Ducati still use) while the swingarm used boxed sheet metal with an eccentric chain adjuster. More HB2s were made.

*A Bimota on the hoof was a rare sight back in the day – it's even rarer now...*



WORDS: JON URRY  
PICS: BIMOTA & FAST BIKES ARCHIVE



**SB2 (1977-1978)**

The SB2 was the first street bike Bimota produced and followed on from the track only SB1. Created at the request of Suzuki Italy only 200 frames were built and of this only 140 became motorcycles. As well as the tubular frame, the SB2 initially carried its fuel tank under the engine, lowering its centre of gravity to improve the handling, but this idea was abandoned for production after issues with heat dissipation. A complete SB2, using the Suzuki GS 750 engine, cost 71 million Lire while a frame kit was 3.1 million Lire.



**KB1 (1978-1982)**

The first Kawasaki-based Bimota was a huge success with over 800 kits sold yet only 16 purchased as complete bikes. The frame fitted the Z900 and Z1 engine, depending on how much of a man you were. The tank was made of plastic that was reinforced with fibreglass while the wheels' spokes were star shaped for strength – and coolness! A two seater version was available in 1980 that came with folding pillion pegs. A complete KB1 cost 7.6 million Lire while a kit was 3.2 million Lire. An updated KB1-A was launched with Marzocchi forks and a double Brembo front disc.



At least the smoke here came from the rear tyre – too often it came from elsewhere...



Bimota branched out into Ducati engine bikes thanks to a former Ducati engineer

► the succession of models with that engine. Having built the first Bimota frames using tubular steel, Tamburini further developed his concept in the early 1980s and mated tubular frame rails to aluminium alloy plates around the swingarm area. Debuted on the KB3, this new concept was revolutionary and relied on the same engineering principles that are still used in modern superbikes. Tamburini understood that to create a chassis that didn't flex, the areas of extreme stress needed to have the maximum amount of bracing, hence the use of aluminium plates.

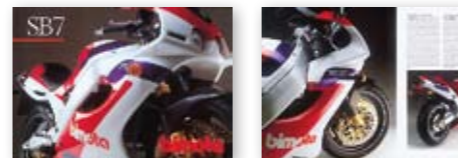
In March 1983 Tamburini decided to leave the company he helped found, citing personal reasons for his departure. The loss of such a gifted designer, and the driving force behind Bimota, had a huge effect on the company, plunging it to near bankruptcy. Five months later former Ducati engineer Federico Martini provided the required direction. Joining Bimota as technical director he brought with him not only the contacts within the Ducati factory that would see the rise of the Ducati-Bimota models, but also a new concept in frame design – aluminium beam.

**IN 1988 BIMOTA WON THE FIRST EVER WORLD SUPERBIKE RACE WITH TARDOZZI**

Debuted on the YB4 in 1986, Martini's aluminium beam frame was a world first for motorcycling. Having secured the supply of FZ750 engines from Yamaha, the YB4 replaced the tubular sections on Tamburini's design with aluminium beams for extra strength. The YB4, and the later YB4R and fuel injected YB4 EI, put Bimota back on the map. At the hands of Virginio Ferrari the YB4R won several races in the 1987 TT F1 World Championship and in 1988 it won the first ever world superbike race with Davide TardoZZi (records show Marco Lucchinelli as the winner as it was an aggregate result and TardoZZi fell off in the second race). Bimota nearly pulled off the unbelievable of defeating the mighty Japanese in the fledgling world series. TardoZZi led the series by 2.5 points going into the final round at New Zealand before a disastrous second race saw him fall, surrendering the title to



The Tesi 1D was a work of art – but not a work of economics



Well, what do you expect with a Suzuki TL1000R engine in it?



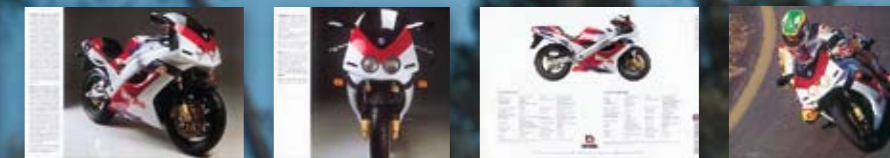
**DB1 (1985-1986)**

The first Bimota built entirely in Italy used a Ducati Pantah 750 engine and was the first bike produced after the departure of Massimo Tamburini. The weird fairing design was to allow for greater steering lock. Oddly enough, 75 per cent of the 453 DB1s made were sold to the Japanese market. The bike cost 15.870 million Lire.



**TESI (1983 ONWARDS)**

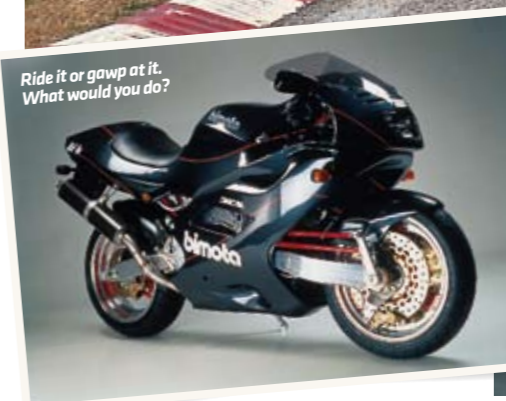
Bimota's longest serving model has been through more than its fair share of facelifts and engine swaps, but the basic design is still the same. The prototype, which was unveiled at the Milan bike show in 1983, even had its indicators incorporated into its fairing. After five prototypes (some which were raced) the Tesi finally made it into production in 1990 using a Ducati 851 engine.



The brochures didn't give you the price. If you had to ask, then you couldn't afford one



Using the FZR1000 EXUP engine, the YB8 was a belter



Ride it or gawp at it. What would you do?



Engineering marvels they may be, but all Bimotas are made for riding hard

Honda rider Fred Merkel. But the race success had achieved its goal, Bimota was now an international brand.

Having stolen the chassis march on the Japanese in the 1970s, by the mid-1980s the 'Big Four' had caught up and Bimota needed a new way of distinguishing its products from mass produced bikes. Having contacted Bimota in the early 1980s, Pier Luigi Marconi and Roberto Ugolini produced a thesis on a revolutionary new design of motorcycle front wheel. Using an oscillating swingarm the university students eliminated the use of conventional forks and created a front wheel that steered via a hub, splitting the steering and shock absorption functions of the wheel to improve rider feel. The project was named Tesi (short for thesis) and after initial prototypes the Tesi 1D 851 was launched in 1990, using Ducati's 851 V-twin engine. But the Tesi failed to catch the public's imagination and the decade saw Bimota adopt a different commercial strategy with the emphasis on developing a range of models.

This new strategy was the brain child of Walter Martini in 1993. Martini embarked on an ambitious expansion programme and between 1993 and 1994 managed to double Bimota's production from 600 to 1200 units a

year. Further expansion was achieved though the creation of new models that brought Bimota into previously unexplored areas such as the 1995 Mantra and Supermono. Alongside these European-engined models, Bimota continued to collaborate extensively with the Japanese manufacturers. The 1994 SB6, which used the GSX-R1100 engine, proved Bimota's most successful ever model, selling 1100 units, and was soon joined in the range in 1997 by the higher spec SB6R. The YB9 was created in 1996 using a Yamaha 598cc engine from an FZ600 to appeal to younger riders. Then came Bimota's most adventurous project yet, not only a new bike but it's own motor.

Having cancelled the Tesi project, Martini directed funds towards developing what was to be Bimota's jewel in its crown – the Vdue, a two-stroke 500cc bike that was going to be the alternative to large capacity four strokes. A decision that brought Bimota to its knees...

Launched in 1997 the Vdue was a disaster. Not only was the V-twin underpowered, the fuel injection was horrific. Rather than a showcase of Bimota's mastery, the Vdue only served to besmirch Bimota's reputation. Owners who were expecting a 500 GP bike with lights and mirrors were left frustrated and many returned their bikes, demanding a



Not all Bimotas were instant beauties, like this YB8 in black

**I OWN ONE**

"Before you consider owning a Bimota you have to understand the company's philosophy. You're buying into their taste, which may not suit everyone. The suspension and fuelling is seldom sorted before they leave the factory so you'll need to get the bike set up correctly. This transforms any Bimota. I know spending money after buying a Bimota may be tricky, but it's worth going the extra mile to improve one. The more effort you put in, the more you will love your Bimota. The stories of unreliability are not true (leaving out the Vdue, but even these can be made to work). If maintained correctly Bimota's are reliable, the biggest problem is getting someone to work on them. Many franchised dealers will not take on a Bimota service. Get a good technician who understands Bimotas and most, if not all, of your problems will disappear. People ask me why they should buy a Bimota - and which one. I tell them not to buy one unless they really want one. As it says on our website - decide on the model you want and stick with it. Remember the one that you want may not be to everyone's liking, but it is to yours and that's all that matters. Bimota is only an alternative to what is available, albeit a very good one, and in this world where we all search to be ourselves, owning a Bimota is a chance to be an individual." Glen - Bimota-enthusiasts.com



**BD3 MANTRA 900 (1995-1998)**

Once seen, never forgotten! Bimota's first naked bike was met with a fair degree of scepticism due to its odd looks and odder name, which translated as 'tool of thought.' The performance of the Ducati Monster 900 engine was OK, the walnut dash possibly a step too far...

► refund. The whole incident proved too much. Having gone bust, Bimota became Bimota Motor SpA in November 1998 with a new management team and a new philosophy. The company would stick with what it knew best - producing innovative motorcycles in limited numbers for niche markets.

The first bike to appear under this philosophy was the SB8R. Using Suzuki's TL1000 V-twin engine, the SB8R built on Bimota's knowledge of carbon fibre gained through the 1997 SB6R. Where the SB6R has a carbon self-supporting seat unit, the SB8R took this one stage further and incorporated carbon into the bike's frame, a first for motorcycle production. While the engineering benefits of this system are dubious, the SB8R proved the point that Bimota was back and put the Vdue debacle behind the company.

Suzuki had originally developed the TL1000R as a 'Ducati beater' in world superbikes, but it never actually raced. The Bimota was different. To everyone's surprise at the 2000 WSB round in Australia the SB8R won the first race, thanks in no small part to the skill of legendary loony Anthony Gobert. The rest of the season was equally as memorable, but for the wrong reasons. The Bimota blew up spectacularly at the next round in Japan and the team subsequently withdrew from the rest of the series.

With the new millennium came (yet another) management change and 2003 saw

new management. The current crop of Bimota motorcycles have been created using Ducati engines, most recently the 1100 air-cooled engine from the Multistrada in the DB5 and DB6, and the 1098 motor in the DB7 and the 1198 in the DB8. The Tesi project has re-emerged in the shape of the Tesi 3D while the Honda CBR600RR powered HB4 is scheduled to be released as a trackday bike based on the firm's Moto2 racer. Considering the economic climate and decline in sportsbike sales is there still a future for a small producer of exotic and high end motorcycles? That's another story all together... ☒



**VDUE (1997-1999)**

The bike that finally broke Bimota was destined to be great. A two-stroke V-twin 500cc that looked glorious and sounded even better. When it was running, anyway. The truth was horrific fuel injection, dodgy build quality and nowhere near the 110bhp Bimota promised. Then there was the price tag, a cool 32.560 million Lire. Bang went the Vdue, pop went Bimota.



The SB6 is now an affordable entry into Bimota world



In race form, the SB8R won a WSB race. Just the one, mind...