

Still one of the best preamps
out there after 23 years

MBL 6010D (2010 version)

Preamplifier

Solid state preamplifier. Launch window: 2010. Inputs: single-ended RCA jacks × 6, balanced XLR jack × 1. Output group 1: single-ended RCA jacks × 6, balanced XLR jack × 1; Output group 2: single-ended RCA jacks × 2, balanced XLR jack × 1. Frequency response: CD: DC-1.0MHz, High level: DC-600KHz. MM/MC cartridge: 20Hz-200KHz. Output impedance: 100Ω. Noise distortion <0.0006%. Signal to noise: CD: 103dB, High level: 102dB. Input sensitivity: High level: 315MV. Input impedance: CD: 3.3KΩ, High level: 47KΩ. Channel separation: 90 dB (CD). Power consumption: 25VA. Dimensions (WHD): 530 × 240 × 360 mm. Weight: 35KG.

Jack Liu

There are at least two extremely expensive flagship preamps that use cheap OP Amps as their primary amplifying components in the market today. One would be the MBL 6010, which was launched in 1987 and the other would be McIntosh's dual chassis

C-100 preamp with independent power supply that debuted a decade later. Both products feature OP AMP NE 5534. Unlike the C-100, which has lost most of its hype after so many years, the 6010 still remains as an incredibly popular product. In fact, numerous DIY enthusiasts have attempted to clone the circuitry of the 6010 in the hopes of reproducing its sound.

Still a brilliant star today, ever since its debut in 1987

If we take a minute to reflect upon the fact that a preamp introduced to the market way back in 1987 is still making its magic today (with constant upgrades to its components with nary a change to its exterior) as one of the best preamps money can buy, it certainly seems like an anomaly in the circle of high-end audio. As for me, being among the few aficionados who have the pleasure of being owners of

the first iteration of MBL 6010, I have kept it in my possession after all these years despite the fact that I have rarely used it as a reference for equipment review nowadays. I have kept my 6010 plugged and powered 24-7 without fail and I have come to associate the inexplicable sentiments I have for the preamp with that little red indicator, which has remained lit for so long. And things would have remained that way if not for the arrival of the latest 6010D (the 2010 version; supposedly the third generation of 6010 according to MBL's website) at my humble abode. The newcomer has mercilessly severed the bond between my first-gen 6010 and me by unveiling the unspoken secret – my first-gen 6010 has passed its prime.

No one is able to defy time. Similarly, no equipment last from 1987 to 2010 without being “old.” During the past 20-odd years, the demand for sound





option 1

option 2

channel 1

channel 1

channel 2

tape 1

mbi 6070 record selector

-12°

-12°

-12°

-12°

-12°

-12°

-12°

mbi 6070 input level adjust

L

Out 1

R

performance among audiophiles has been growing (not changing) slowly and subtly. However, since it is a subtle and slow progression, it would be very difficult to discern the margin of improvement within a couple of years. On the other hand, although the progression of increasing demand for audio quality has been so minute that it was hard to distinguish, after a span of 23 years, I did eventually notice differences between the first generation 6010 and the latest 6010D. I must admit, the discovery of such differences has been a very unique

experience. I started off by auditioning the 2010 version of 6010D and I was reassured that the traits of the sound coming from 6010D were my cup of tea and that was exactly what prompted me to purchase the first-gen 6010 years ago. And then it struck me: How would it be possible for the new 6010D to carry a sound signature that is identical to what I heard more than 20 years ago? At least that was what I thought at the moment. When I hooked up my first-gen 6010 to the set up for a direct comparison with the 6010D, I found myself flabbergasted: For some unfathomable reason, the

sound coming from my trusted 6010 was no longer the sound that captivated me; it was the sound from the new 6010D that turned out to be the mirror image of the sonic bliss I had grown so attached to.

It was quite a shock because I can still vividly remember the characteristics of the sound from my 6010 when I bought it – a sweet, open, broad sound with adequate punch presented with a brilliant golden hue. That was the sound I fell in love with. And yet, compared to the latest 6010D, what came from my vintage preamp was like a faded old



The 2010 version of MBL 6010D is officially out. According to Sound Art, despite its identical exterior, what's inside the preamp has gone through a major upgrade and its model should really be changed to 6010E. But for some reason, MBL hasn't chosen to do so.



photograph that has turned yellow and lost all luster and it was the sound from the 6010D that I had come to associate my 6010 with. It is just like meeting your first crush after losing contact for over 20 years; the image of the perfect figure and complexion has been burnt deep into your memory and you thought it would stay that way. But right at the first glance, you will come to the realization that your crush has actually aged and that time spares no one.

Another look at the vintage 6010 from an updated perspective

To be brutally honest, if I were to rate the performance of the vintage 6010 from the perspective of an audiophile of today, I wouldn't have cared much for the preamp from what I heard today, simply because it failed to deliver the sweet, open, broad, punchy and brilliantly golden sound that I anticipated. But here lies my dilemma: I am willing to swear that those were the qualities of the sound I identified from this preamp years ago. And thus, we come to the million dollar question: Did the performance of my vintage 6010 "regress" after more than two decades of faithful service? Or has my expectation of a "sweet, open, broad, punchy sound with a brilliant golden hue" gone up unconsciously by 20 odd years of exposure to high-end audio?

In other words, given the level and standard of Hi End audio 23 years ago, the perfect score for a "sweet, open, broad, punchy sound with a brilliant golden hue" for designers of 6010 preamp and audiophiles at the time would fetch just about 70 points by today's standards; only the sound from 2010 version's 6010D would be worthy of the perfect score. I couldn't help but shudder at the revelation – if MBL were to launch 6010X 20 years from now and the chief editor of Audio Art were to compare the 6010D and 6010X, would the same scenario happen once more?

Now, if you were to ask me, "Do you believe in the 'aging' of sound from audio equipment after 20 years of use?" My answer would be a definitive yes. The only thing I am not sure is the extent of sound deterioration caused by equipment aging. Let's be realistic here: No electrical component is spared from the process of aging; the surface of the input jacks oxidize eventually and cause

poor contact; even the potentiometer would deteriorate after so many years of friction and oxidation. If it were true that the amp had indeed gone through severe deterioration after more than 20 years, we could, in fact, make a bold assumption: The characteristics of the sound from the first-gen 6010 (23 years ago) resemble the sound from the latest 6010D today. This assumption will explain why my impression of 6010 would match the sound of 6010D. But if that's the case, we would face another cruel fact: It would mean the sound of 6010 hasn't improved all that much after more than two decades. No! I refuse to believe that and I am sure many high-end enthusiasts would agree with me. I would rather believe that the sound from my preamp has indeed deteriorated after more than 20 years of use and I am more than confident that audiophiles' demand for sound quality has grown significantly higher over the years. It is the combined effect of these two factors that has severed my sentimental attachment to my vintage 6010. While I am on the subject, I would like to remind my readers that the discrepancy in sound quality that is under discussion in this article pertains strictly to the comparison between my first-gen 6010 and the 6010D launched in 2010 and my observation does not apply to the comparison between other versions of the 6010D and the 2010 version of the preamp. Since I have not performed an A/B test between a 6010D and the latest 6010D released this year, I am not really in a position to make such presumptions.

6010's accomplishment in sonic excellence remains a mystery

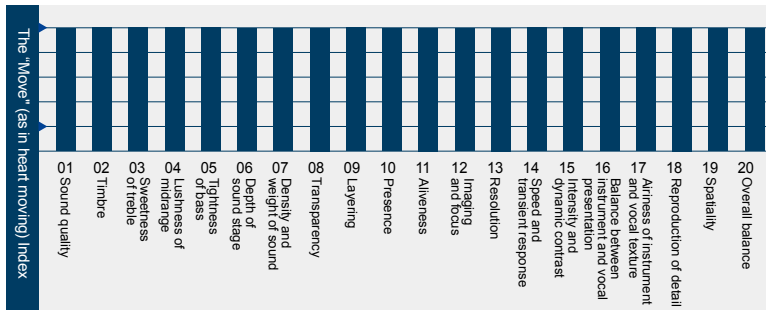
Perhaps some of my readers might have the misconception that the 6010 was MBL's first preamp; that is actually not true. Founded in 1979, MBL's first product was the 100 Radialstrahler loudspeaker, which is the predecessor of MBL 101E. The company's second offering was the 4010 preamp, launched in 1981. It was succeeded by the 5010 preamp in 1985 before the arrival of 6010 in 1987. Some astute readers may wonder: What drove MBL to adopt the OP Amp as the amplifier architecture for its preamps? The reason is simple: It just so happened that Philips launched its new NE5534, which was touted

to be specifically designed for high fidelity audio equipment. An OP Amp can replace many circuitry structures. Coupled with the fact that preamps do not require a lot of power, the OP Amp's characteristics make it very suited for preamps. I guess that's the reason MBL chose to use NE5534 for the 6010. Later on, people began to realize that NE5534 isn't really much of an earth-shattering component; it still has numerous innate flaws. In order to get the best out of NE5534, one has to design many compensatory circuits to complement it. Curiously enough, some audio manufacturers and DIY enthusiasts have attempted to use NE5534 to build their preamps, but none of them came close to what the 6010 could do. Is it because of the circuitry design? That can't be the reason because the scheme of 6010 has long been revealed and you can find easily find it on the Internet. In reality, the 6010 was designed based on the application circuitry published by Philips for NE5534 and it is nothing sophisticated. This is why many audio enthusiasts believe that the sonic characteristics of 6010 did not come from NE5534 or its circuitry design; the secret has to lie in its power supply, its potentiometer, the choice of its internal wiring, the design of copper wiring on the PCB and even its chassis structure. I believe that all these factors, including the use of NE5534 and their ingenious combination, are critical elements that made the sound of 6010 so enticing. This also explains why, no matter how hard DIY enthusiasts try, they will never be able to recreate the sonic qualities that resemble the sound coming from a 6010, unless they clone the preamp in full with 100% identical parts and components.

Designs that are blatantly against the "high-end" philosophy

To be fair, the design for 6010 is not entirely without faults. For the longest time, I couldn't help but wonder what compelled designers at MBL to include so many switches in the 6010; shouldn't high-end preamp developers avoid switches? It is important to realize that most high-end preamps have the least a number of switches possible. If we were to do away with all these switches on the 6010, would its sound get better? Would such an operation take away that unique

The 20 requirements for audio equipment:



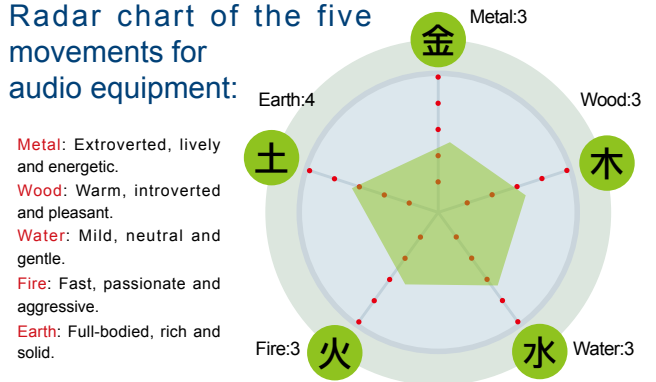
"The 20 Requirements for Audio Equipment" is a subjective score that the reviewer has awarded to the equipment being reviewed and the score may vary depending on equipment matching, spatial conditions and even the reviewer's physiological/mental state. Any attempt to use the score as a basis to compare two different equipment may not be interpreted as subjective.



On the rear panel, input and output jacks are still separated. The rear panel is in one piece, without any slots.



Radar chart of the five movements for audio equipment:



Reference album:

BIS Records is renowned for the impeccable recording quality that audiophiles have come to associate with their albums. Not surprisingly, Ilya Gringolts Paganini delivered more than my expectations. Despite the popularity of Paganini's music and the fact that audiophiles probably have multiple recordings of Paganini's works by various musicians (including the critically acclaimed album by Salvatore Accardo), I am certain that adding this album to your collection will further enrich your enjoyment, especially in the area of outstanding recording. (CD No.: BIS CD-999, Sunrise Recording)

Focus and recommendations:

Focus: 1. A vibrantly golden sound that is sweet, open, broad and punchy. 2. Compared to its predecessor, the new 6010D's treble is more pronounced; its midrange and bass are also well paced without compromising its lushness. 3. Incredible resolution and lots of detail without sounding awkward.

Recommendation

Recommendation: 1. If you are looking for a sound that is taut and full, pair the 6010D with MBL's dedicated source and power amplifier. 2. If you intend to use the 6010D with source or amplifiers by other manufacturers, go for gears that give full bodied and warm sound signatures.

1 My first-gen MBL 6010 is custom built, which explains the placement of different features on the top panel. Let's take a look at the differences between the oldest version of the preamp and its latest incarnation.

2 My MBL 6010 came with an indicator for input voltage on the left of the top panel. I am pretty sure that few preamps exist in the world with such a feature.

3 The rear panel on the first-gen 6010: As you can see, it is rather different from the 6010D. Back then, balanced input wasn't popular, which is why all the input jacks are RCA.

4 Look closely at the balanced input jacks; do you notice anything unusual? See the 4-pin balanced input jack on the left? That's the original jack from MBL. Do you not find it curious that the left and right balanced output jacks have 3 pins in them? Yes, I had them replaced in order to save myself the trouble of hunting down 4-pin balanced cables.

5 See those tiny switches? Those are for adjusting cartridge capacitors and impedance if you have a setup with MM cartridge.

6 On the right side of the first-gen 6010 are pods for the adjustment of input voltage and sensitivity for MM/MC cartridge, one for each channel in Groups A and B.

7 My first-gen 6010 came with a rear panel that has various expansion slots for expansions to be added to the preamp.

8 Where are the serial numbers on this 6010? Has it been intentionally concealed? That's not it; the 6010 doesn't have a serial number because it was custom built by MBL.

magic from the sound of the 6010? Not only that, the 6010 still features the oldest type of rotary switch available for the selection of input paths; hasn't such a switch been obsolete for quite a while? If so, why is MBL still using it? Not to mention that the potentiometer you see on the 6010 is also the most traditional one available. Despite MBL's claim that the potentiometer tracks at better than 0.8% accuracy between channels, haven't other high-end audio manufacturers moved on to adopting much more advanced volume control systems these days?

Reflection I: Is it possible that designers and engineers at MBL are unaware of the fact that the more components you put into equipment, the more likely that sound quality could deteriorate? If the answer were negative, why would they (in their right mind) choose to keep so many switches on the 6010?

Reflection II: Are MBL engineers so incompetent that they couldn't even design a decent volume control system using resistor arrays with relays? Are they unaware of the many respectable analog volume control chipsets available on the market today? If not, why are they still using the most traditional potentiometer at this point?

Reflection III: Are MBL engineers unaware of the fact that modern amplifiers are designed to have the least number of internal wirings to ensure the shortest audio signal path? If so, why does the 6010 still have its overbuilt chassis? Perhaps these unconventional choices that go directly against the present-day logic behind the design of preamps that have made 6010's sound so uniquely charming.

At this point, you are probably wondering, "What exactly is so charming and enticing about 6010D's sound?" Please bear with me a little longer; we will get to that very shortly. Allow me to go over the preamp in the proper order for a product review and let's start with its exterior. The 6010D is literally identical to its previous version judging from its exterior alone. However, MBL did perform a major overhaul on its internal components. While the panel is still a thick piece of black acrylic (only the first-gen 6010 has a metallic front panel with gloss finish; later on MBL realized that the yield rate for the front panel process was simply too low and

decided to use black acrylic instead), the two big, solid brass knobs plated in thick 24-karat gold are still as classy and eye-catching as ever. The volume indicated on the front panel is in a blue fluorescent display and I should point out that the numbers do not actually represent volume level; it is the numerical presentation of changes in volume voltage that help users to distinguish the level of volume. To be perfectly honest, if you were to compare the third generation 6010D and the first generation 6010D by their exterior alone, they look virtually identical.

The upgrades within

Having the same exterior, what were the internal changes in the new 6010D? Let's see: First of all, the new 6010D features two toroidal transformers and power supplies; one for the amplifier circuit and the other for the controller circuits (for remote control and digital volume display). Both are isolated and shielded with MuMetal. Secondly, the 6010D comes with a potentiometer by MSP and it is entirely enclosed in red copper. I did look up MSP on the Internet but didn't find anything relevant. This means I have practically zero knowledge about the manufacturer. Although it is a traditional potentiometer, MBL claims that it tracks at better than 0.8% accuracy between channels. Thirdly, with the exception of the path from CD input to output being directly coupled, all other input paths have coupled capacitors. If you are wondering why MBL has chosen not to directly couple all input paths for the best sound quality, here's my take on the matter: you cannot judge the 6010D with "conventional wisdom," that's all. Instead of using NE5534 as its OP Amp, the third generation 6010D now comes with AD797 (in reality, MBL replaced NE5534 with AD797 for the first version of 6010D) with faster response speed and wider bandwidth. Two AD797 are used for both the balanced XLR path and analog RCA path.

Next, the amplifier PCB has been redesigned and all former electrolytic capacitors by Elma or Jamicon have been replaced with Panasonic's premium blue capacitors with gold lettering for substantial improvement in sound quality. With the previous generation of 6010D, users wishing to

operate the preamp with the remote control had to toggle the input switch on the front panel to "Remote" in order to do so. But with the latest 6010D, front panel operation is no longer necessary. In addition, all internal wirings are done with single crystal copper stranded wire. Some parts even use two sets of single crystal copper stranded wire. The potentiometer is connected to the PCB through single core copper wire. Engineers at MBL have tested these wirings extensively before finalizing their choices and they have definite impact on the preamp's sound. Finally, the PCB in the vintage version has a PC expansion slot, whereas the latest version offers the same function through internal wiring.

Source matching is critical for 6010D

With all that said, what MBL did to the internal components of the 2010 version of 6010D really doesn't matter as much as its performance. Now let's get to the fun part – the testing. I started by using Bladelius Gondul as the source component and it didn't take long for me to realize that the preamp does not synergize well with the 6010D; although the treble is brilliant and magnificent, the sound is rather fatiguing and violins sound a tad too obtrusive coming from the combination. However, when I connected the Gondul to my vintage 6010, the glaring flaws vanished immediately. The treble I heard from the combination was sweet with an impressive luster; it was brilliant without being shrill. Not only that, violins sounded gentler as well. Why is that? Apparently, the new 6010D is just like a concert hall with newly replaced light fixtures; the venue is illuminated with golden brilliance. On the other hand, while my vintage 6010 is also a concert hall, it has been in use for many years and though the lights still carry their golden luster, the intensity of the light has fallen significantly.

Well, that's not the end of the story. When I played Rega Isis with the latest 6010D, something remarkable happened: The treble from the combination had a brilliant golden luster; it was sweet, bright yet not the least bit piercing. Violins sounded full and concentrated without being obtrusive. It is obvious that the Isis' full-bodied and introverted characteristics had a special synergy with 6010D's sonic qualities.

Do note the metaphor I used to describe the sound of 6010D: “A brilliantly lit concert hall.” If you are wondering what it means, it is really nothing profound. If you frequent the National Concert Hall or other renowned concert halls abroad, you know that these venues are really brilliantly illuminated in golden lights. That is exactly what the 6010D sounds like. Compared to Spectral DMC 30SS, the golden hue is without doubt coloration. Despite being coloration, I believe it is brilliantly done and the results are nothing less than euphonic. I am confident that anyone listening to the sound of the 6010D would forget their demands for neutrality for the moment and indulge in the dazzling brilliance of the concert hall. And that, dear readers, is the most appealing charm of the “sweet, open, broad, punchy sound with a brilliant golden hue” from the 6010D.

Sweet, open, broad and punchy

In addition, the qualities of sweetness, openness, broadness and punch are easily noticeable in the 6010D. Take the Golden Voice Concert Hall album by Tsai Chin for example; Tsai Chin’s renowned magnetic voice sounded fuller, sweeter and more airy. The notes from the piano sounded tighter and the music carried more weight. Not only that, the guitar sounded gentler and other string instruments benefited from enhanced sound quality. In addition, the music is more transparent with more details; the instruments sounded more realistic with better imaging. On the album *The Best of Play Bach*, the vibrations of the bass keys were more resolute and bouncy; the clash of cymbals was crisper; and the pianist’s touch on the keys sounded more apparent with better response. The bass and bass drum benefitted from better bounciness and punch. Although the amount of bass from the new 6010D was slightly less compared to the vintage 6010, it performed better in terms of bass resolution.

On *Songs My Mother Taught Me*, the bow on the violin strings produced more detail; the treble sounded more pristine and the strikes of the piano keys emitted more force and made the music sound

livelier. And when I put Okihiko Sugano’s Best Sound Selection (published by Stereo Sound), my heart raced as I listened to the tracks; how could the recording be so realistic and natural? Although the low frequency noise from the recording equipment was very noticeable, it did not affect the brilliance of the ultra realistic recording on that album. The cello solo by Starker couldn’t have sounded more beautiful and one could easily picture the bow being drawn across the instrument’s strings from the pure and pristine sound quality. The Japanese plucked string instruments, the shakuhachi and the percussion instruments sounded so realistic that it was simply incredible. From the notes of the piano, I could visualize the pianist playing a magnificent sounding grand piano in a superb concert hall with outstanding reverberation due to its spaciousness and brightness. The trumpet sounded thick and radiant with luster and airiness without being the least bit shrill to the ear. To be honest, I have had this SACD (it is really more of a book) for quite some time but none of my previous listening sessions created an impact that could rival this specific session with the 6010D. I have never felt more connected to the expression of Okihiko Sugano through his recording because the music I heard was more than just realistic; it has a beauty that words fail to describe.

Let me cite another CD for example: the Ilya Gringolts Paganini by BIS (BIS CD999). During the violin solo in the beginning, the sound coming from the fiddle exuded a special quality and its tone had a golden hue. “Majestic” is the adjective I would use to describe its sound. When I got to the concertos, the bounciness and body of the string instruments sounded as if it were ensnared in a big net and was constantly changing its size within the net; it sounded rich, full with depth and weight. If I were to compare my impressions of the CD between the 6010D and Spectral DMC30SS, the 6010D sounded bouncier with a unique style, whereas the DMC30SS performed like a faithful high fidelity piece of equipment that simply gave what the CD had to offer without

additional colorations. To be frank, both sound great and the choice between the two will depend on your mood and the occasion.

Still one of the best preamps out there

“Although 6010 has already been on the market for over 20 years, it is still an incredibly moving preamp.” That was how I felt after auditioning the 6010D. To be candid, although the 6010D is very resolute, compared to other mind-bogglingly expensive preamps I have auditioned, it certainly did not outclass them by a huge margin. Yes, the 6010D sounds extremely lively, but it is by no means the only choice out there. While the 6010D has received numerous accolades for its beautiful sound, many other preamps could evenly match it, not to mention the fact that the 6010D is definitely less neutral than several contenders. Despite all that, I could not forget the charm and charisma of a sound that is so sweet, open, broad and punchy with a brilliant golden hue. If we were to rationally examine the designs of 6010D, it really doesn’t qualify as an “advanced” preamp. But coming from the standpoint of pure music appreciation, the MBL 6010D is, without a doubt, still one of the best preamps out there.