



Brian Hodgson with Dudley Simpson at the Electrophon studio, Covent Garden, 1973

WHEEL VISITED BRIAN HODGSON AT HIS HOME IN THE NORFOLK COUNTRYSIDE WHERE HE LIVES WITH HIS PARTNER AND PET SPANIELS. HE REGALED US WITH TALES OF HIS BRILLIANT CAREER IN ELECTRONIC MUSIC, STARTING WITH THE SONIC DETECTION OF SUBMARINES...

Interview by Michael Garrad

Brian Hodgson made a singular contribution to that most singular of British institutions: The BBC Radiophonic Workshop. For nearly forty years the Workshop was the BBC's experimental electronic audio department, drawing sounds from far-out places and bringing them into the homes of — and sometimes over the heads of — millions of British listeners and viewers.

As an Assistant in the Radiophonic Workshop during the early '60s Hodgson contributed special sounds to projects ranging from one-off dramas to schools programming. He is best known for creating atmospherics for Doctor Who — including the Tardis take off effect and the raucous screaming of the Daleks.

As Doctor Who regenerated and continued his battle with terrifying extra-terrestrial foes, so Hodgson's role changed to that of Organiser of the Workshop. His own battles with BBC Management ensured the latest music technology made it safely into the Workshop's Maida Vale studios.

In advance of a special Radiophonic Workshop concert by his former colleagues Peter Howell, Paddy Kingsland, Dick Mills and Mark Ayres, Wheel asked Hodgson to recount memories of his involvement in electronic music over the years. To start off we asked what he was doing before joining the Workshop.



Left: Brian Hodgson aged 23 from the time he started at the Workshop;
Right: Report on a hospital radio show Brian produced aged 14, from Liverpool Echo - Brian, top photo, second from right

“I went into the Air Force to do my National Service. I worked in Sonic: the detection of submarines. We used to drop these great big cylinders and they’d give you the bearing of a submarine, picking up the cavitation noise. I was stationed in Northern Ireland and we had a great time, going out boozing in Derry and all the local places. This was before the troubles got really bad, before the IRA got into the final stages — long before Bloody Sunday.

I’d always been vaguely interested in working with sound in theatre as well as in radio. While in the Air Force I had a tape recorder with which I used to do bits and pieces — experimenting, making weird sounds. Nothing very special, just amusing oneself. Usually slightly pissed.

When I got out of the Air Force I worked as an actor. I went straight out on tour with this strange play called A Girl Called Sadie which was a sort of sex play — very much in vogue. I was on about the eighteenth tour of it. We played all the dives in the North of England in a very cold winter. It was really

horrible; horrid theatres and we weren't playing to good business. I had my twenty-first birthday on stage in Middlesbrough and we closed a week later.

When I got back home I had a call from another theatre saying I'd been recommended as a stage director in Swansea. I went there for the season and then from Swansea to Bolton as stage manager and also playing...you know...it was sort of madness. This is all still when I'm twenty-one.

I'd seen adverts for Studio Manager jobs at the BBC. I used to get the train from Bolton down to London to do my interviews and then get back in time to play twice nightly with the first performance at five o'clock. This was around '61, '62 maybe '60.

I got a job working at Central Programme Operations and External Services. I came off stage on the Saturday night and started at the BBC on the Monday morning. Fortunately, because I'd come out of the theatre I almost went straight into the Drama department. We were doing probably a play a week so it was like being in weekly Rep. All the old radio actors were around and a lot of the old theatre actors would come in to work for [producers] Val Gielgud, Archie Campbell and Martin C. Webster. It was a great time for Radio Drama.

I'd expressed an interest in an attachment to the Radiophonic Workshop and they seemed interested — I had gotten a reputation for doing sound effects for Radio Drama and showed a creative aptitude for working with sound. I was invited to go to the Radiophonic Workshop for three months and stayed there eleven years.”

The Radiophonic Workshop was drastically under-resourced for many years. Its staff created out-of-this-world sounds using very basic equipment. By sheer will and technical resourcefulness, the Workshop's creative minds quickly solidified their reputations as pioneers of electronic music, a genre still in its infancy in the 1960s.

“You had to be incredibly creative with very few tools at your disposal. ‘Fag ends and lollipops’ was a term I invented to explain how the Radiophonic Workshop worked without a budget. The fag ends were the leftovers from other people's budgets and the lollipops were things they used to jam into Desmond Briscoe's [Manager of the Workshop] mouth to shut him up because he was always whinging that he didn't have any money to buy equipment for the department.

There were no synthesisers — you used old radio equipment that had been cannibalised: bits from redundant stores, lampshades, bottles, scaffolding, poles... you could work with anything that made a noise. We were using musique concrète techniques; natural sound as the basis. There were very few electronic devices around, although we did have oscillators, a white noise generator and a Wobbulator, which was basically used for testing

reverberation times. You could sweep it from sub-sonic to super-sonic, just by turning a dial.

Dave Young was an amazing engineer who had been in a prisoner of war camp and he used to construct radio transmitters from old cigarette packs, nails and bits of wire; a real genius. He used to go down the Portobello Road and pick up all sorts of odds and sods and make things like a scanner we called the Crystal Palace.

He would create stuff for us because there was no money to buy anything, but there was also very little to buy because apart from tape recorders and mixing desks, the electronic music industry hadn't really started at that point.

We only had three tape recorders in each room. We didn't have multitrack so it was a question of getting someone else in and going 'done, two, three, go' and you'd press the buttons at the same time — if you were lucky!

For the first six years we were working on [reel-to-reel tape recorders] Ferrographs, a BTR/2 and a wonderful machine called the Motosacoche, which had been built by a motorbike manufacturer in Switzerland during the war and the BBC bought them. There were two and they were amazing, they actually ran together in sync — once they got up to speed, which could take up to ten, fifteen seconds.

They were housed in this console and if you wanted to service the motors you pressed a button and they rose majestically into the air. You opened the back and got inside underneath with spanners and things, just like working on a car. Dick [Mills] tells lovely stories; they would still work when they were going up on the lift and if you really wanted to frighten a producer you'd stand with your back to the machine, press the button and they would rise majestically and the producer would see their programme disappear away. We were all about 21, 22, you know, fairly high-spirited and having a wonderful time — and also taking it very seriously. I mean we were working very hard."

Unlike Workshop colleagues Delia Derbyshire and John Baker, Hodgson had no musical training. His background in theatre informed his own particular approach to his work and method of composition.

"I never used to call the stuff I made myself 'music'. I was more interested in what I called the theatre of sound. I was creating atmospheres that were not conventionally music in their form. Nobody sat down to create a piece of formal electronic music, it was always a contribution to enhance a radio or television programme. I think that's what gave the Workshop its vivacity.

It all tended to be rather intuitive. I'd start by trying to work out what the programme needed from me, what atmosphere, and pick up an idea and a set

of sounds. For the Tardis we were working to a graphic that Bernard Lodge had done so it had to sync with that graphic. It was some video feedback he'd done which was part of the original opening of the programme. I remember watching Exodus at the Kensington Odeon and in the interval I drew the Tardis takeoff on the back of the programme. I literally had a drawing which was the score and I knew what I was going to do and how I was going to do it.

They had said they wanted something that travelled through time and space; I remember the phrase 'a rending of the fabric of time and space.' So I wanted a rending sound. We used the piano bass string and my mum's front door key which I scraped down the string. Then we took the recording and tuned it, cut it around, put feedback on it and things.

I wanted to do things that sounded like they were coming and going at the same time so I used a lot of reverse feedback — you put feedback onto a sound so it goes BANGBANgBANgBangbang and it goes a bit quiet, then you turn the tape around so it goes bangBangBANgBANgBANG! Then you put more feedback on it so it approaches and departs. I did that with white noise and little cut-up pieces of oscillation and put it all together.

It's about the only thing — that and some of my stuff of the Dalek control room — that's left of the original Doctor Who because the music [for the current series] doesn't sound anything like it. They've done a wonderful job with the new Doctor Who. They have the technology at their disposal and they do a great job. But I just caught the sig tune last night and I thought 'oh my God it's gotten so messy!' It's been so overlaid, I think Ron [Grainer] would revolve in his grave. But that's personal taste you know."



Brian at home with vase

The upcoming Radiophonic Workshop concert at the Roundhouse promises to be a world apart from the live events that took place during the nascent days of electronic music. Unit Delta Plus, the

studio run by Hodgson, Derbyshire and Peter Zinovieff, took part in several such events in 1967 and 1968 including the Million Volt Light and Sound Rave — also at the Roundhouse — which famously featured the single airing of The Beatles' 14-minute electronic piece Carnival of Light. By all accounts this single airing was more than enough and it has never been heard again. Hodgson describes the Rave as “complete chaos, as it was in those days.”

“Electronic music concerts in those days... you stuck a couple loud speakers out and sat thoroughly bored listening to tapes. Concerts would consist of Stockhausen setting up a tape recorder and pulling faces as he altered the fader. It was only later that people started including live instruments and actually doing performances. Hugh Davies of course had his Sonic Book — he would do live performances with all these gadgets he'd got inside this big box folder.

We did one of the first electronic music concerts ever at the Mill Theatre in Newbury, as Unit Delta Plus. We filled the theatre with paintings by Peter Zinovieff's daughter Sophka; lovely children's paintings all around the room. We had some electromagnetic sculptures by Paul Takis and a light show by the Hornsey College of Art. That was a nightmare because it would take them about an hour to set up and it never got to the right temperature. It was absolutely amazing.

[Later, in the 1980s and '90s, The Radiophonic Workshop] used to go to the Ars Acoustica festival. We'd be in Matera in the South of Italy which was a town carved out of volcanic rock with a great sort of valley at the side of it like a chasm. We'd have loud speakers on the side of the valley in these old rock churches. The environment itself became a performer. There was one amazing night, we played Revelation and to hear I am Alpha and Omega, the beginning and the end, boom out across this valley and then bounce back off the other side of the valley was utterly magic.”



Radiophonic Workshop staff, 1978: Front row l-r, Brian Hodgson (after rejoining the Workshop as Organiser), Desmond Briscoe (Manager and co-founder of the workshop with Daphne Oram), Dick Mills. Back row l-r, John Downer, Peter Howell, Roger Limb, Elizabeth Parker, Paddy Kingsland. Briscoe's hand rests upon the Crystal Palace

Moonlighting from the Workshop over the next few years saw Hodgson create electronic sound for the theatre including Brief Lives with Roy Dotrice and Paul Scofield's Macbeth at Stratford. He and Derbyshire also created electronic inserts to Ron Grainer's

musical On the Level which, despite including some of the first laser projections, Hodgson says was a "a disastrous flop."

Working out of their Kaleidophon studio, Hodgson, Derbyshire and David Vorhaus also recorded library records including ESL104 for Standard Music Library (famously used in the ITV show The Tomorrow People) and the commercial LP An Electrical Storm as The White Noise, although Hodgson's involvement in the latter was marginal. He also wrote scores for the structures in Peter Logan's Mechanical Ballets.

“[The Mechanical Ballet] Square Dance was in fact four right angle pieces set at the corners of a square on motors which would revolve — they were absolutely amazing. The Tate Gallery bought Square Dance and occasionally exhibits it. We did one at the Royal College of Art and one at the Whitechapel Gallery where he actually flooded the gallery to a depth of one-foot-six and put structures in. We had a room upstairs that ended up as a meditation room where I had all sorts of sounds going.”

In 1972 Hodgson took the chance to immerse himself in these extra-curricular activities full time and left the BBC's Maida Vale studios for Covent Garden to establish Electrophon — yet another excellently named studio — with Delia Derbyshire.

“I gave everything up, cashed in my pension, cut my hair short — which is a favourite thing I did in those days. If ever I was changing direction I'd cut my hair short. I threw away most of my clothes except a couple of pairs of jeans, a few t-shirts and decided to live light. I opened Electrophon using the money from my pension scheme to buy equipment.

At Electrophon we did the John Schlesinger Olympics piece for the Visions of Eight, a film about the Olympics with eight different directors — '72 I think it was. It's very interesting because I used Peter [Zinovieff's] original computer that he worked with when he was doing the vocoder. We hired it for the morning and created one particular piece for the sprinters on the marathon running through the streets.

I did four ballets for Ballet Rambert with the choreographer Christopher Bruce, Forest for London Contemporary Dance with Bob Cohan and Unfamiliar Playground for the Royal Ballet. We also did a few albums, New Atlantis and Where Are We Captain? [as Wavemaker]. The first album we did was with Dudley Simpson which was a pseudo-Walter Carlos thing called In the Covent Garden. Just after I went back to the BBC I ended up doing Derek Jarman's Tempest.

Delia was supposed to join me [at Electrophon] but she was not in the right state; she was not really at her most creative at that point. She seemed almost

on the edge of a breakdown, of really not knowing what she wanted to do and feeling the pressures were all too great.

She did a little bit on The Legend of Hell House [horror film for which Electrophon composed the soundtrack] but not very much. Once we started Electrophon she really opted out and eventually was a radio operator on the gas line they were putting in all over the country."

Before Hodgson left the BBC in 1972 the biggest technical change the Workshop saw was the purchase in 1971 of its first synthesiser, the EMS Synthesi 100 or Delaware, designed by Peter Zinovieff's Electronic Music Studios. When Hodgson returned five years later on, he found that internal BBC politics had shielded the Workshop from enjoying the technological advancements that had occurred in the outside world.

"I went back to the Workshop in '77 as an Organiser with a specific remit to rebuild the place. The Workshop was still very tatty, with not a lot of equipment. There was the one big synthesiser, the Delaware, which was getting a bit past its sell-by date. The important thing was they still had most of the original equipment from when I'd left; there was nothing new except a vocoder and a big mixing desk which had fallen off the back of somebody else's scheme.

Just at the point when I got back Aubrey Singer became Managing Director of Radio. He brought a lot of people from Television, including a new Organiser of Studio Operations, called John Dutot. John came to the workshop and I did a big number about 'no money, don't have a proper budget' and he said 'well if I brought Director of Television Resources over would you show him the Workshop and talk to him?' So he came over and was fascinated by it and he asked me to do a report.

On the basis of that report he gave us a budget — for the first time the Workshop had a budget. We knew exactly how we could develop and we rebuilt the Workshop over that next five years, one studio a year. I wanted a studio for every composer so they knew their studios inside out. They were all properly equipped and as we did it each studio reflected the newest of the technology, ending up with Studio F, which Peter [Howell] did.

Peter had this wonderful idea with the coming of MIDI and created this amazing studio using a Yamaha mixer and they were all controlled by MIDI from the computer. He created a completely automated music studio. Gradually over the period we built up the Workshop so at one point the Yamaha engineers said it was the most sophisticated MIDI environment in Europe. We were producing loads of music.

Once I was back at the Workshop I very seldom did any creative work. I never had a chance to play with all the new equipment that was coming in because I

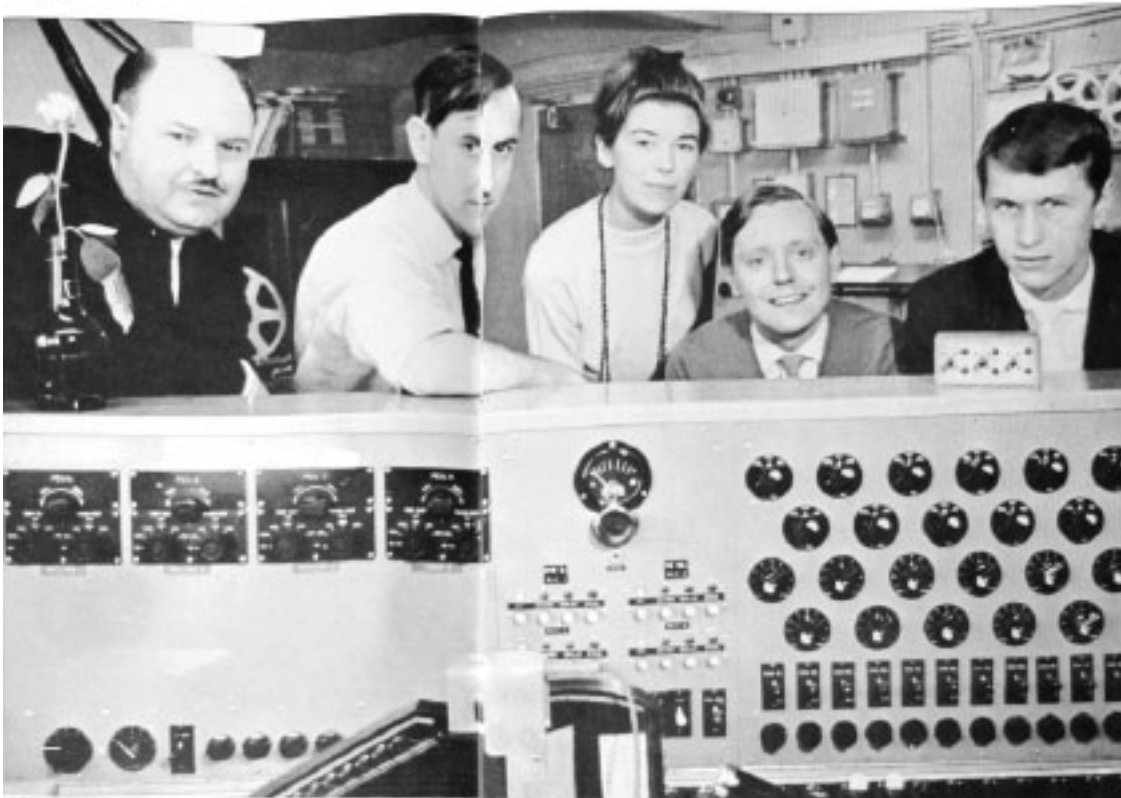
was always planning the next studio, looking for the next piece of equipment just coming off the technology production lines, basically keeping the Workshop surfing the wave of technology. We had such brilliant people there at that point.

Once we had the technology there it enabled us to work fast — we could try an idea out and say, ‘this is rubbish — forget it let's go on.’ People were able to concentrate on the music and not so much on the technology because they started to be able to take technology for granted.

Then, of course, came Maggie's revenge. [Director-General] John Birt came on the scene and we had to go into a market economy — nobody's ever successfully made any public organisation into a market economy. They certainly didn't do it with the National Health Service and I don't think they successfully did it with the BBC. The BBC suddenly changed overnight. I think it needed to change but how it was changed... I have my reservations about that.

Peter Howell said that once they had decided they didn't want the Radiophonic Workshop anymore they should have just said ‘look chaps we can't afford you anymore, thanks for everything you've done, let's have a big party and all go home.’ Instead they let it wither on the vine.

When it fell apart everybody felt almost as if it was their fault, whereas it wasn't. There was just no way the Workshop could have survived in the market environment; there were too many other people who were able to produce the sorts of things we were doing in their bedrooms. Most kids nowadays have more technology in their bedrooms than the Workshop probably had in the first twenty-five years of its life."



Clockwise from top left: Painting of Brian with his dogs by his partner Richard Pointing; Brian at home; The Radiophonic Workshop team in 1965 - l-r, Desmond Briscoe, Dick Mills, Delia Derbyshire, Keith Salmon, Brian Hodgson

The BBC Radiophonic Workshop finally closed for business in 1998, just shy of its fortieth birthday, without fanfare. In 2008, to celebrate fifty years since the Workshop's founding by Daphne Oram and Desmond Briscoe, there were five Radiophonic releases on CD. While its end may have been unceremonious, the popularity and influence of the Workshop's jingles, sound effects and themes has not diminished.

“We introduced a whole generation — a couple of generations — of children to new sounds, new forms. A lot of people who are now working in the medium first experienced electronic music on Listen With Mother. Kim Ryrie, who

designed the Fairlight Computer Music Instrument, got into electronic music and then eventually into building this amazing machine because he was a Doctor Who fan.

The influence the Workshop had on people was vast. I see it as an opening of the mind, and of the ears. People aren't using the traditional tape manipulation techniques anymore because you can actually achieve most of the same results with a computer. So you're still using the basic sounds, still using a concrete source. When I talk to people who are really interested, they will get inside, change the sounds, create their own sounds. And that's what it's about: the creation of sound, the creation of new forms that aren't based on traditional musical forms.

There's nobody around now doing electronic music that I actually listen to. I enjoy the music of an American composer called Mike McNabb who I think wrote the first coherent computer piece. His score for Invisible Cities... unfortunately I lent that to somebody and I never got it back.

I listen to more Mozart. He was out there to make an impact; he didn't write for theory. Mozart did applied music very much as the Workshop did. It wasn't written off the top of his head for no reason at all. It was written because it was commissioned."

The Radiophonic music and sound effects that have been compiled and released commercially represents but a fragment of the total archive. Hodgson says there is a good reason for this: a lot of the archive is, in fact, not that good. The Workshop churned out material constantly to fulfil the demands of BBC television and radio — the records and CDs treat us to the real standout pieces. We finished by asking Hodgson if anything else resides in the archive that has been overlooked or is particularly memorable to him.

"When you look back, when you're doing three, maybe four hundred programmes a year... There are the obvious things... Revelation, Dreams, Amor Dei, Evenings of Certain Lives, Peter's Inferno Revisited. I'd quite like to hear some of the stuff I did for Philip Saville's play The Rainbirds but I believe that it's been destroyed. I loved working with Philip Saville, I think he was an absolutely brilliant television director who always seemed to get the best out of me.

I did the sound score for Philip's The Machine Stops, which was [a television play adapted from a short story by] E. M. Forster. It was the first television programme ever to win a film festival. The BBC edited it, didn't tell Philip or I and it won first prize! I used Dave's sixteen input scanner to create a sort of foretaste of minimalist music which in the play was referred to as 'Music of the Brisbane School.' I also used filing cabinet drawers — God, the whole

gamut of rubbish that we had around at the time. I think I managed to drop a spring echo at one point in it and when that slowed down it made amazing sounds of ends of worlds and things. Louis Niebur uses it on his composition courses, first at UCLA and now I think he's at San Diego.

I helped Peter [Howell] produce *Inferno Revisited* [1983], which was fun because it was the first time I was able to get back to doing anything sort of creative. There's one nice sound of a cavern in Hell I did which I'm really pleased with; it was basically an intake of breath, frozen into an electronic reverberation machine and then held as a constant. It still sends a chill down my spine!

I suppose my signature sound was the bass strings of the piano. That's what most people remember. I used that piano frame quite a lot — it was a frame taken out of an upright piano so you could get at everything. A lot of things were done on that.

I would say 99 per cent of my work was crap but some will find the odd 1 percent in there that made any difference at all. Creating the original sound stuff for *Doctor Who*, creating the Daleks' voices, the Tardis, all of those things which are now part of the fabric of life — that was exciting. I enjoyed what I was doing, that was the main thing. I was very lucky to be in that position. End of story.