## MINUTES OF ORAL EVIDENCE

taken before

#### HIGH SPEED RAIL COMMITTEE

On the

#### HIGH SPEED RAIL (LONDON - WEST MIDLANDS) BILL

Tuesday 14 July 2015 (Afternoon)

In Committee Room 5

## PRESENT:

Mr Robert Syms (Chair) Sir Peter Bottomley Mr Henry Bellingham Mr Geoffrey Clifton–Brown Mr Mark Hendrick

#### IN ATTENDANCE

Mr Timothy Mould QC, Lead Counsel, Department for Transport Miss Nathalie Lieven QC, Counsel for Petitioners

Witnesses:

Mr Robert Duggan, Wendover Parish Council Mr Brian Thompson, Halton Parish Council Mr Tom Walsh, Wendover Parish Council Mr Ian McCaul, Wendover House School Mrs Wendy Gray, Road Farm, Wendover Mr Steve Summers, ACCON UK Limited Mr David Johnson, Malvern Hills Hydro Limited Mr Ron Peterson Mr John Savin

## **IN PUBLIC SESSION**

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1. CHAIR: Order, order. Welcome, good afternoon, to the HS2 Select Committee, continuing with petitions 106, 1512, 605 and 83: Halton Parish Council, Wendover Parish Council, The Wendover Society, Wendover HS2 – 'Stop HS2', I presume that is.

2. I don't want to go into any post-mortems as to why people weren't here at 11.30 am this morning, but I stress to any other petitioners that you are listed at 9.30 am. This is an unpredictable process and we have a lot of people to get through, so please turn up on time. I have ruled that you have one hour to give your case, which I suppose for a barrister is the equivalent of speed dating! I am sure that as you're not the longest barrister that we have in front of us, but one of the punchiest, you will prove again that you can get through the Wendover case in that time.

3. MISS LIEVEN QC: We will absolutely do our best, sir. Can I just start by apologising? Again, no post-mortems. We don't know what happened. I'm very sorry from our end that the messages were mixed. I hope at least the Committee had a longer tea and lunch break. So many apologies.

4. Sir, can I start just very briefly in opening by stressing that what we are here to do today is to talk about Wendover, impacts on Wendover and what we want specifically relating to Wendover. I know the Committee has heard a lot about long tunnels and different long tunnels. All we are going to say about the long tunnel is that that's our preferred option, but we are also going to say that if we can't have a long tunnel then extended green tunnels are better than the HS2 proposal.

5. The evidence today is going to be focused around local residents/members of the community. There are two experts, one on hydrogeology and one on noise. I'm going to try and keep their evidence both short but also very targeted around the very Wendover–specific issues rather than try to give the Committee a lecture about hydrogeology generally. I should say that we've got quite a lot of witnesses so there's going to be quite a lot of swapping, but it seemed to me that that was a sensible way to get across the different impacts on Wendover. What Mr Mould and I have agreed is that if he wants to cross–examine anybody he says before they leave the witness box. I hope that's all right with him.

6. CHAIR: He rugby-tackles them before they go!

7. MISS LIEVEN QC: Yes, exactly. Well, I thought he could put up his hand, but he can jump on the table or whatever suits!

8. MR MOULD QC (DfT): I'm going to be very abstemious.

9. CHAIR: Okay.

10. MISS LIEVEN QC: So if I can start with my first two witnesses. Sitting closer to you, sir, is Mr Duggan from Wendover Parish Council and closer to me is Mr Thompson from Halton Parish Council. The idea is they're going to do a bit of a double act in terms of starting off the presentation. I do hope that's acceptable. So over to you, gentlemen, and the first slide please.

11. MR THOMPSON: Thank you for seeing us. We are a kind of group of four different organisations, but we've come together to try and give a single voice to Wendover and try and get the best mitigation for Wendover and the AONB. I will say that we have quite a lot of public support. You'll probably notice that there are about 191 petitions, representing about 450 petitioners, so it is a subject which is very alive to the people of Wendover. Without any more ado, I'll pass over to Bob.

12. MR DUGGAN: Okay. I'm chairman of Wendover Parish Council and have been for the last five years. As far as I can tell, not that I know personally, the population of Wendover is 8,500, with over 3,300 houses. RAF Halton, which I'm sure you will have heard of, is a very historic and famous RAF station and vital training facility.

13. SIR PETER BOTTOMLEY: If it helps, we can read this as fast as you can.

14. MR DUGGAN: Okay.

15. SIR PETER BOTTOMLEY: If we are going to have some initial slides, we can take them now.

16. MR DUGGAN: Fine. Okay, well I'll just give you a personal aspect. I've lived in Wendover for 35 years. My son was married in the church at Wendover. Another son was christened in Wendover.

17. CHAIR: Is that the church that we went into when we were there?

18. MR DUGGAN: It is indeed, yes.

19. MISS LIEVEN QC: We've got a picture of the church, sir, just really for Mr Hendrick's purposes. Of course the other members of the Committee, I think, all went on the site visit and so are familiar with the church.

20. SIR PETER BOTTOMLEY: It was impressive.

21. MR BELLINGHAM: It was very impressive.

22. MISS LIEVEN QC: A very nice church and beautiful town.

23. MR DUGGAN: Thank you. Yes, so those pictures just basically show how beautiful Wendover is and how much we enjoy it. Those aren't necessarily the best bits, but they are a fantastic part of Wendover. The next slide please.

24. MR HENDRICK: I find it quite strange looking at the back for the two speakers. We've got two members on this side and only one on the other. Would it not be better perhaps to interchange seats with the two female guests, swap seats maybe?

25. CHAIR: This isn't an ideal room for what we're doing unfortunately.

26. MR BELLINGHAM: Maybe a compromise would be that when you answer, gents, you spread your favours around, as it were!

27. MISS LIEVEN QC: Perhaps Mr Thompson can move slightly closer to me and twist around and then it's a little bit more even–handed between the two sides of the horseshoe.

28. CHAIR: Wendover one way and Halton the other way!

29. MISS LIEVEN QC: You're not allowed to divide my case so early on!

30. MR THOMPSON: Okay. Just to carry on, Holton is a fairly small, rural parish. It's a split parish which means it starts in the Vale of Aylesbury and runs up into the Chilterns. It's fairly small and has a population of about 900, but it does have RAF Halton there which has about 2,000. We're outnumbered, but that's fine.

31. CHAIR: You still talk to each other though?

32. MR THOMPSON: Yes, we do. They're very good neighbours, I have to say. RAF Halton owns Halton House, which was built by the Rothschilds. The picture on the right is Wendover Woods, which is a very popular tourist attraction.

33. SIR PETER BOTTOMLEY: If you show the next slide you could point to it because they can't see where you're pointing.

34. MR THOMPSON: Okay. Sorry.

35. MISS LIEVEN QC: The next slide please. So this slide is showing, again really for Mr Hendrick's purposes, where the HS2 proposal relates to Wendover. Brian, or one of you, just point out the main features on this, please.

36. MR THOMPSON: Okay.

37. SIR PETER BOTTOMLEY: The people behind you need to be able to see where you're pointing.

38. MR THOMPSON: Coming from the south, it comes in on an embankment and then goes to a 500–metre Wendover Dean viaduct.

39. SIR PETER BOTTOMLEY: Point to it.

40. MR THOMPSON: Which is there. It's 18 metres high so it's very large in the countryside there. It then leaves that on an embankment before cutting through the corner of a hill in a cutting before it then approaches the small Dean viaduct, which is here, which is again another 500–metre viaduct which is about 14 metres high. It then approaches Wendover from the south, running fairly close to the church.

41. SIR PETER BOTTOMLEY: Does it go over the railway line or under it?

42. MR THOMPSON: It goes over it.

43. SIR PETER BOTTOMLEY: All right.

44. MR THOMPSON: It then hits a green tunnel which has a cowl – that 1.1 kilometre green tunnel – then another cowl and then it comes out on a cutting which rises slowly as it departs from the area. So visually it would be quite intrusive. I will just stop there.

45. MISS LIEVEN QC: If I can just interpose at this stage for those members of the Committee who aren't so familiar. In the HS2 material there is a series of photomontages that show the viaduct over the road and railway but also the scale of the Wendover Dean Viaduct, which is very large, it would be fair to say. So the next slide is perhaps self–explanatory. Just explain, would you, what it is that you're asking for.

46. MR DUGGAN: It echoes really what Nathalie referred to earlier. Our principal ask is for a fully bored tunnel through the Chilterns and underneath that, if you like, is the extended green tunnel to the north and south of Wendover.

47. SIR PETER BOTTOMLEY: Do you know which is more important: the north or the south?

48. MR DUGGAN: It depends where you live – north or south.

49. SIR PETER BOTTOMLEY: There is no interest like self interest!

50. MR DUGGAN: Then the sort of menial or lowest grade ask is higher barriers and bunds and legally enforceable noise limits.

51. MISS LIEVEN QC: Next slide? We're not going to talk about the geology or engineering of the bored tunnel, but what would it do for Wendover?

52. MR DUGGAN: So it would save the AONB, it would reduce the risk for the Wendover Arm Canal, it would enable St Mary's Church to continue to be a community centre and do away with the noise issue and it would protect the Wendover heritage, reduce visual blight, save agricultural and tourist businesses, remove property blight and safeguard people's health.

53. MISS LIEVEN QC: Thank you. Then over the page – we're going to come back to this in detail towards the end – can you just explain in terms of the Wendover– specific mitigation, so the middle bit of the pyramid of asks? Just give an outline of what we're asking for. You can point to the slide.

54. MR THOMPSON: So if I start at the north, what we're asking for here is that the green tunnel here is extended 500 metres northwards. This is to protect the noise issue we have on that side of the town. The 'southern extension' is to help people in

Bacombe Lane going past the church and the school. It's to make it into a kind of surface tunnel by putting an enclosure on it up to where the viaduct is and then putting an enclosure on the viaduct. That should help the whole noise issue.

55. SIR PETER BOTTOMLEY: Sides and top?

56. MR THOMPSON: Yes.

57. MISS LIEVEN QC: Yes. We've got a visual of that later, sir.

58. MR THOMPSON: Then the third one is to continue with an enclosure on the embankment as it goes past London Road to give them some relief where the noise comes and impacts them. I'll go into that in a lot more detail later.

59. MISS LIEVEN QC: The next slide sets out just a summary of the impacts and the topics we're about to cover. Mr Thompson is going to retire at this point. I'm assuming Mr Mould has no questions so far. Mr Walsh is coming forward to speak specifically about tourism. So if we can go on to the next slide, we come to the issue of heritage impacts in and around Wendover. This is back to you, Mr Duggan.

60. MR DUGGAN: Okay. There are many heritage impacts which, if I had longer, I could spend eight hours talking about, but the photographs sum up one or two aspects. I think it's just important to pick out half a dozen important things. The earliest written reference to Wendover was in the Saxon period, in AD 43 to 410, so it's quite old. There were Roman excavations. There's a Roman road leading in the Wendover direction and there was a Roman settlement at Wellwick Farm. There are two mills which are recorded in the Domesday Book. St Mary's Church, which is believed to date from the twelfth century, is by far the oldest surviving building in the town. The church, which I'll come to in a minute, is very, very important to Wendover.

61. MISS LIEVEN QC: If we put up the next slide, you can locate a number of those features on this slide, if you can pick out the church of St Mary down on the southern side. Yes?

62. MR DUGGAN: Welwick Farm is there somewhere. Where's Welwick Farm? Up there? Various Roman finds are up here. The Mill House is there. That's the old Mill House. The point where St Mary's is is thought to be the original centre of Wendover, which now is recognised by the clock tower further over to the north.

63. MISS LIEVEN QC: Just before we leave this slide, I think it's worth pointing out that the whole of the centre of Wendover is a conservation area and you can see the little blue dots are all listed buildings up and down the high street.

64. MR DUGGAN: There are all sorts of other buildings. Roman and Saxon artefacts have been unearthed in the grounds of the school campus next to the church and the earthwork at Hampden Meadow, which is not far from the church, is a link to ancient history. In Pound Street, there's a house there which has a prominent lacemakers window, lacemaking being one of the famed services provided in Wendover many years ago. The other important part is the Grand Junction Canal, or the Wendover arm of the canal, and that was helpful in opening the Wendover branch of the waterway linking with industry as it was.

65. MISS LIEVEN QC: Do you want to point out where that is, Mr Duggan?

66. MR DUGGAN: Sorry. I can't find it on the screen.

67. MISS LIEVEN QC: We're just locating it.

68. MR DUGGAN: I can't see the canal.

69. MISS LIEVEN QC: Well, it will come up later on the ecology slides. Next slide please.

70. MR DUGGAN: As I mentioned earlier, St Mary's was supposedly built in the twelfth century. It's used by many, many groups and is used for many community activities as well as religious services. It was recently refurbished at a cost of about £900,000, raised from local funds. There are issues on noise with St Mary's which will be referred to later in the noise section. The noise of the railway passing as it stands at the moment is too loud to continue to use it as a music or concert venue and if you're in the churchyard tending graves or whatever, it would be impossible to have a quiet moment.

71. MISS LIEVEN QC: Just whilst we've got that photograph up, Mr Duggan, can you just point to where HS2 will be running in relation to that photograph because it

gives one quite a good sense of the area?

72. MR DUGGAN: It's going to go over here.

73. MISS LIEVEN QC: Just on the other side of that tree line. Is that right?

74. MR DUGGAN: Yes. That's the existing railway there.

75. MISS LIEVEN QC: Where the arrow is, you can see the road going over the Chiltern line. Is that right?

76. MR DUGGAN: It's the other side of that.

77. MISS LIEVEN QC: Mr Walsh, can you just explain who you are, please?

78. MR WALSH: I'm Tom Walsh. I've lived in Wendover for 47 years, since I was 13 years old. I did a bit of education there and I've built a business there. I've actually served on the parish council for as long as Robert: five years. Fundamentally, my concern - and a lot of the concerns of businesses in Wendover, who I'm well connected with - is that the impacts of the construction phase will cause visitors to choose surrounding villages to go to, to get into the Chiltern Hills. We will lose an enormous amount of visits. Tourism generates £16 million to our economy per annum. Basically, it employs 520 people, which is a significant number. A lot of it is to do with services and customer-facing. We have 96 businesses that are engaged partially or wholly in supplying things to visitors, as well as to people in the village. What it also does is it sculpts the offering of the high street of Wendover. Basically, we have a wider range of restaurants because tourists and people from outside the village come to visit us. We have a better quality of public houses, for example. We have more shopping opportunities, more gifts and so on and so forth. I believe you visited one of our popular public houses which has a large car park to take visitors. We are surrounded by other attractive villages. Obviously if we're noisy, dusty and full of tippers, it's unlikely that we're going to be particularly popular compared to villages without that sort of thing, especially if somebody comes out from the city and wants to spend a quiet day in the landscape. I believe one of you guys can drive a heavy goods vehicle and would know that walkers and cyclists and people of that ilk don't get on well with heavy goods vehicles. So a lot of our business is to do with people walking in the hills and it's

unlikely to be a popular destination whilst the construction phase goes on. It's also unlikely to think of it as anywhere that you go to have a weekend away where you are subjected to loud noises at an interval of just a few minutes on a regular basis. Maybe an hour or two at a funfair, but the idea that you've got it 24/7 is not really going to be a tourist plus. So we stand to lose a fair amount of money, which one of my colleagues will come on to later.

79. So basically, as we're compressing things, that's our take on it. HS2 seems to be under-doing it. Now, if we had a tunnel, I feel it could decompress some of the traffic problems. As a young man, I dug a few tunnels. They're quite efficient. You don't tend to dig anything out that you don't want to dig out. There's no double handling. There's no messing about. They're quite efficient items. You're probably going to reduce the spoil take. You're going to reduce the traffic coming in and out of the sites. It will be significant. The pressure on the junctions around Wendover: if you think of Wendover as a crossroads, you've got three of the junctions that have enormous roundabouts on the bypass. You saw them when you came on the bus, excusing you, sir, as you didn't come. The fundamental thing is HS2 does say there will be major problems with these junctions while the construction phase is on, so basically if we can take any of that pressure off those junctions it might well ease the situation.

80. MISS LIEVEN QC: Can I just break it down a little bit, Mr Walsh? In terms of the construction phase, what do you think will be the effect of the construction traffic, the difficulties at the junctions, the undoubted fact that during the construction phase there is going to be a scar on the landscape across this part of the Chilterns? What do you think that will do to visitors at that point?

81. MR WALSH: I think it's a very negative impact on visitors. I think people are going to say: 'Well, we can go to Tring. We can go to Princes Risborough. We can go somewhere that isn't scarred or covered in lorries'. I think that's the choice I'd make.

82. MISS LIEVEN QC: In your slide you make the point that Wendover has lots of cafés, pubs and restaurants. How dependent are those on day–trippers from London?

83. MR WALSH: Well, not just from London. Day-trippers from Aylesbury even come out to use our facilities. If I can equate it to the last time there was a major upheaval in the local economy – RAF Halton changed its role in the air force.

Previously it was a technical training establishment. Apprentices were there for three years and they became part of the community. They used the facilities. The new training regime is much more high intensity and the lads don't come down into the town so the benefits of their pound go on the camp. The result was one pub closed and was built on, another pub became an Indian restaurant and the pub that all the NCOs used to use became a kind of trendy wine bar. I believe it also had something - and I was told this by the manager - to do with the NatWest Bank branch closing. So the impacts of chiselling away at our economy, even on a small scale, actually have quite large impacts on the community that lives there.

84. MISS LIEVEN QC: Thank you very much, Mr Walsh. Just one point on that, sir. It isn't in the exhibits. Well, I don't know whether it is in the exhibits or not actually, but the PRD that HS2 put in to the Chiltern Society petition actually acknowledges that during the construction phase visitors will merely visit another part of the AONB, so there's nothing that we are saying that is in any sense unexpected or indeed not obvious. So can we move on to the next slide? I think this is one which we can pass over quite quickly because another witness is going to come back to it. I will just lead through this for the purposes of time.

85. MR WALSH: Okay.

86. MISS LIEVEN QC: This shows the bands of blight around Wendover, drawn up on the basis of the Pricewaterhouse report, in effectively 100–metre bands. Sir, I think that's just there for the Committee to see the construction blight impacts and then the green tunnel blight impacts. Of course if there were a deep-bored tunnel that would be removed. We probably don't need to say any more about that.

87. MR WALSH: I think that will be dealt with later on by Dr Savin.

88. MISS LIEVEN QC: So if we then move on to the next slide, please. This is back to Mr Duggan. This is health impacts in Wendover during both construction and operation.

89. MR DUGGAN: Very briefly as most of these are self–explanatory. The source of a lot of this information was from our local GP, who has just retired, a radiologist who has just retired and myself, who spent 45 years working in the health service. One of

the key aspects is that a whole generation will be affected by HS2. Certainly in the construction phase there will be traffic delays and so on and an increase in social isolation. The age range of people living in Wendover – people are living longer and older – so those will be less frequent. The aspects of chalk dust, COPD and lung disease and asthma problems. There is also an age–related lifestyle. A lot of people come to Wendover, like myself, and stay, think we might move on or whatever. I intend to stay there for the rest of my days. Deaf people – those that wear hearing aids – can be affected disproportionately by noise. In the operational phase, I suppose the key thing that certainly interests me is the link with noise and stress and obesity. I refer to a Swedish report published in the BMJ which basically related people's girth with the amount of noise from trains. I'll leave the rest to you. We'll take our leave.

90. MR MOULD QC (DfT): Can we just put up A12147? It's just to make sure we've got the alternative in mind, Mr Walsh. We're going to put up a slide. Your concern is about the impact of constructing the green tunnel on the tourist business in Wendover. This, I think, goes to your primary case for a long bored tunnel. If you look at the slide in front of you, you will see that in order to construct the long bored tunnel, which is your principal ask, it will be necessary to have what Mr Blaine yesterday described for the long tunnel, estimated to be about a 50 hectare tunnel drive and construction site and segment factory broadly speaking in the area which is shaded in pink. Okay?

91. MR WALSH: Yes.

92. MR MOULD QC (DfT): To the north of the town. If you assume that in place of your construction site for the cut and cover tunnel you have a 50-hectare, 24-hour-working tunnel drive and construction site there, do you think there's going to be any appreciable difference in the impact, if any, of those works on the tourist trade in Wendover?

93. MR WALSH: Yes, I think there would actually.

94. MR MOULD QC (DfT): Really?

95. MR WALSH: I think that area you've identified there is removed from the Wendover main habitation. It's actually the other side of Wendover there, where the

hillsides are. It wouldn't really have much impact on that at all.

96. MR MOULD QC (DfT): All the traffic that's serving that, as we heard yesterday from Mr Blaine, is going to be coming up and down the A413 past Wendover.

97. MR WALSH: How much traffic increase -?

98. MR MOULD QC (DfT): You'll have to ask Mr Blaine that because it's his case, but it's going to be a substantial amount of construction traffic.

99. MR WALSH: Substantially more than -?

100. MR MOULD QC (DfT): Assuming that you've got a substantial quantity of construction traffic serving that long bored tunnel works site coming up and down the A413 past Wendover.

101. MR WALSH: I wouldn't comment on that without seeing the numbers.

102. MR MOULD QC (DfT): Thank you very much.

103. MISS LIEVEN QC: Can I just say on this slide, sir, that Mr Thompson later is going to come back to this when we're talking about the construction of the green tunnel and indeed the impact on Stoke Mandeville.

104. So if I can ask these two gentlemen to withdraw and put up the next slide. This is the next of our slides, which should be slide 17. I'll ask Mr McCaul to come forward. The next two slides are about the impact on Wendover House School, which the Committee may have noted on the map is very close to the church.

105. CHAIR: We went past it, I think, when we were going to the church.

106. MISS LIEVEN QC: Yes, I think that's probably right, sir. Mr McCaul is the head teacher of the school. Mr McCaul, can I just ask you to explain the nature of this school, please, and the range of children you have?

107. MR McCAUL: Yes. This is Buckinghamshire's only school for kids with social, emotional and communication difficulties. They all have special educational needs. At secondary phase, it's boys and girls. Now, that, for people who know about special education, is a combination of kids with ASD, which is autistic spectrum disorder, and

BESD, which is old money now given Government changes, and special educational needs.

108. MISS LIEVEN QC: Just tell us what 'BSD' stands for.

109. MR McCAUL: 'BESD' means behavioural, emotional and social difficulties. So they're very, very complex kids. Very complex indeed.

110. Now, I think what's about to happen to the school, because we've got a construction roadway going through the top end of the field, will cause increased risk enormously for the school. These kids manifest their need in many cases in behaviour – and extreme behaviours. We're very good at what we do. The school is a finely-tuned machine and we mitigate against all risk. This is a risk that I am not sure how we are going to deal with if it does happen.

111. MISS LIEVEN QC: Just talk a little bit, if you would, about what you perceive the impact of HS2 to be on the children.

112. MR McCAUL: Okay. So we've got noise, so the noise distraction, especially for kids who've got ASD. Some of these kids have hypersensitive hearing. They won't be able to function in the classroom. They won't come to school, I would guess. The kids who've got the behavioural issues will be drawn to the construction traffic. They'll be drawn to the trains, if and when they eventually appear, and there will be risk associated with that. So you will see educational outcomes go down, you will see incidents increase in the school. There will be an increase, in my view, in injuries to students and an increase in injuries to staff. Now, that is without me fairly thinking through and talking to representatives from HS2 about how this could be mitigated against because I have no idea; I really don't. What's about to happen will have consequences for the kids who are there when it does happen and for generations to come. It's quite serious stuff.

113. MISS LIEVEN QC: Can we just examine it a little bit more? In terms of risk and risk to staff, just explain a bit about how you see that occurring in terms of the ability of your students to concentrate, their distractibility and so on.

114. MR McCAUL: Well, for me, it's obvious. We control our environment and it's

peaceful and it's calm. The staffing ratios can be anything up to two members of staff to one child. Distractions like this, such as noise and traffic and trains, will change that. The staff will be at risk because they'll have to try and manage that. Other children in the classroom will be put at risk by individuals who are drawn to it or who lose concentration or who start to misbehave. I'm at a loss to know how people are going to mitigate against this or HS2 are. What you're going to see is a school which is currently very high performing turn and go in another direction – downward.

115. MISS LIEVEN QC: Can we then split it into internal space and external space? I know that you're in discussions with HS2 about mitigation. With all credit to HS2, I think they will probably come along with a hopefully very comprehensive package of internal mitigation measures in terms of double glazing and so on. How much external space do you have?

116. MR McCAUL: There's a lot.

117. MISS LIEVEN QC: How important is it to the operation of the school?

118. MR McCAUL: Again, there's a lot of external space. We run the National Curriculum. We need it for PE. We need it for the outdoor curriculum. We need it for playtime. It's an enormous site. It's a beautiful site. It's a shame you didn't visit when you were there, but I know your time is short. Given the noise that was played in the church that day, I'm not sure how we're going to use the outdoor space in the future. I'm not sure. Outdoor space comes in the doors the minute I open the window and I can't think how I'm going to not open the windows in the school to allow the school to be ventilated. With HS2, yes, you're right. They have noted that this is a problem and we've got five representatives coming out this week to talk to us about what they can do.

119. MISS LIEVEN QC: Just one other point in terms of the permanent operational impacts. Obviously for most of the population, if you have a high speed train whizzing past, whatever it will be, 36 times an hour, to some degree one will acclimatise to it or perhaps most people will acclimatise.

120. MR McCAUL: Yes.

121. MISS LIEVEN QC: How easy do you think that would be for your pupil group? Obviously it will be a different generation of pupils to the ones there at the moment, but the same type of problems.

122. MR McCAUL: Yes. Well, there's been 20 studies done that I'm aware of on how noise impacts upon educational outcome and that was across mainstream. I couldn't find anything on noise and special educational needs, especially with this client group. So the fact is that noise does cause issues. It reduces educational outcomes. In terms of the ASD children, they have difficulty predicting what comes next. If I came into this room and clapped my hands loudly, a lot of people might jump and be frightened by that. If I repeatedly do it, people get used to it. With kids with ASD – and by the way, they're all individuals and all different – if I do that and then ten seconds later do it again, each and every time I do that they will be frightened by that. They cannot process sound in the same way that you or I do. They're not neurotypical.

123. MISS LIEVEN QC: Just one other point that we haven't touched upon: vibration as well as noise. Is vibration a concern?

124. MR McCAUL: Well, it is a concern. We've got a sensory room in the school and we've got kids who won't go into that room until we turn a switch off in that room because they're picking up noises and vibrations which I can't hear. I will go round turning off all the switches and go 'Which one is it?' and it's that one. It makes no difference to me, I'm not sensing anything different, but again it's typical of our children – hypersensitive – that they will hear something or feel something that we do not feel and they can't process that. It impacts upon their education, it impacts upon their behaviour and it impacts upon safety.

125. MISS LIEVEN QC: Thank you very much, Mr McCaul. Those are all of my questions.

126. CHAIR: Mr Mould?

127. MR MOULD QC (DfT): I'm not going to ask any questions. I'm just going to make the point if I may, as we are on this issue, that, as this gentleman has just mentioned, we are in discussions with the school. We have our next meeting with them on Thursday. The Committee has already heard that under the arrangements in the draft

Code of Construction Practice we do acknowledge that there will be special cases – schools are high on the list of those candidates for special cases – and I suggest that we look to make early progress with formulating a package of measures to cope with the construction effects of the scheme as they potentially affect this school. We will keep the Committee informed of progress as we go through. Of course I accept that that is without prejudice to the case which Miss Lieven will want to make, but that is what we will do in any event, as the Code of Construction Practice indicates.

128. MISS LIEVEN QC: Thank you, Mr McCaul. Sir, if I can then move on to the next slide and agricultural impacts and Mrs Gray. I've passed over the impact on the school slide because Mr McCaul had covered it. Mrs Gray, can you explain who you are and why you are here?

129. MRS GRAY: You have your maps around you. I was born at Road Farm. Road Farm is opposite Leather Lane. You visited and we were very, very grateful to the Select Committee for visiting. It made a very big difference to everybody to be able to voice their opinions to you.

130. I live actually on the opposite side of the valley to HS2, but I am very grateful for the opportunity to represent our neighbours today who will be extremely affected by the current plans for HS2, which will be taking 257 hectares during the construction phase and of that there will be 106 hectares of permanent land take. Seventeen farms are directly affected in forum area 10, which is the Wendover part, and sixteen in forum area 9, which is more the Great Missenden area.

131. If you go forward to the next slide, please – I'm going to come back to this one, but I'd just like to show you this next slide – it gives an example of the percentage loss to the farms of the area. Hunts Green Farm, which you passed, will be having a loss of 47.8 per cent of its hectarage. Obviously the red colours down that table highlight those farms which are going to be experiencing over 30 per cent loss of their land. The yellows highlighted are between 10 and 30 per cent. Those of you involved in business – I'm sure many of you are – are aware that if you're going to lose an average then it will be 22 per cent of their income-generating assets. Businesses that lose that amount are not likely to be able to continue as a viable enterprise.

132. MISS LIEVEN QC: Can I just stop you there for a moment, Mrs Gray, because