EDUCATION AND HEALTH STANDING COMMITTEE

INQUIRY INTO THE CAUSE AND EXTENT OF LEAD POLLUTION IN THE ESPERANCE AREA

TRANSCRIPT OF EVIDENCE TAKEN
AT ESPERANCE
WEDNESDAY, 2 MAY 2007

SESSION TWO

Members

Dr K.D. Hames (Acting Chairman)
Mr T.G. Stephens
Mrs D.J. Guise
Mr T.K. Waldron
Mr M.P. Whitely
Dr G.G. Jacobs
Mr P. Papalia

Hearing commenced at 10.33 am

STEWART, MR COLIN
Chief Executive Officer, Esperance Port Authority, examined:

MATIJASEVICH, MR JAMES
Civil Engineer, Esperance Port Authority, examined:

The ACTING CHAIRMAN: Ladies and gentlemen, we are going to get underway. If there are any new members in the gallery, I say welcome to you. We are very pleased that you have come along to hear the proceedings today. There are certain procedural requirements. This parliamentary committee acts as an extension of the Parliament itself; therefore, similar to council meetings, you are welcome to be here, but we ask that you do not make a contribution to the debate. People are welcome to make written submissions. We have just announced an extension of the date to 25 May - there are notices on the chairs to that effect - to allow people to make further submissions. If people hear something today that triggers their desire to make a written comment, please feel welcome to do so. For today, we ask that you do not participate. We have before the committee the Esperance Port Authority. On my left we have the Hansard reporters. They will record all the proceedings that occur here today. From a sound point of view, it is very important that people do not make noises that will make it hard for the Hansard reporters to hear. The other issue is the microphones. They seemed to work well in the first session. However, if anybody present cannot hear, please let us know. For the two representatives from the port authority, I say to you that it is very important that you do as I am doing and talk straight into the microphone.

This committee hearing is a proceeding of Parliament and warrants the same respect that proceedings in the house itself demand. Even though you are not required to give evidence on oath, any deliberate misleading of the committee may be regarded as contempt of Parliament. Have you completed the "Details of Witness" form?

The Witnesses: Yes.

The ACTING CHAIRMAN: Do you understand the notes at the bottom of the form?

The Witnesses: Yes.

The ACTING CHAIRMAN: Did you receive and read an information for witness briefing sheet regarding the giving of evidence before a parliamentary committee?

The Witnesses: Yes.

The ACTING CHAIRMAN: Do have any questions relating to your appearance before the committee today?

The Witnesses: No.

The ACTING CHAIRMAN: We are in the preliminary stages of this inquiry; that is, the information gathering stage. Some of the questions that members will put to the witnesses may cover issues that have already been dealt with in the witnesses' written submission. However, witnesses are asked to be patient as members would like their responses to be on the public record. Some submissions have not been published at this time. We are also planning to raise concerns that have been raised in other submissions. The committee has received your submission. Do you want to make any amendments to that submission?

Mr Stewart: No, we do not.

The ACTING CHAIRMAN: Do you wish to make a statement regarding your submission prior to commencement?

Mr Stewart: Yes. Both the chairman and myself would like to make a statement.

The ACTING CHAIRMAN: Please proceed.

Mr Matijasevich: You have my name. I would like to make two short opening statements. Prior to that, I will give you some of my background so that you know where I come from. My background is managing growing businesses in the construction industry. Until recently I was an executive shareholder of a global provider of rail construction and maintenance services. The company did various large projects around the world, including the Dublin transit system and the new Delhi metro and many other projects of that size. This statement will focus on what I have learnt about the port and its efforts to address its part in the issues at the centre of this inquiry and also to look to the future.

I have been chairman since August last year. I am relatively new to the ways in which the port's technical aspects are carried out. In relation to the issues we are dealing with today, my assessment for the short period that I have been chairman is that we have a hard-working and conscientious port and staff who have clearly recognised that growth requires vigilance in relation to environmental and community issues. However, in my observations, several years of rapid growth have put immense pressure on the port and its organisational strategies and structures. To its credit, the board recognised this issue and commissioned an external review of the management structure just prior to my appointment. In my view, a bigger effort in this area was needed to ensure we are properly resourced to address the continuing challenges. We have over the past six months taken a number of steps to enhance the organisation's capacity to meet the challenge of growth both at management level and within the board. I would specifically note that toxicologist Michael Jackson was recently appointed to the board, and that further appointments are being considered. As one of the major economic players in our region, and one of the largest employers in the town, we recognise that we have a special responsibility. We will do whatever we can to work together with the community, port users and regulated agencies to redress situations and find suitable solutions.

The other message I want to leave the committee today is that we are taking steps to ensure no further impact occurs and to move towards sustainable solutions that ensure the good health and prosperity of Esperance. We recognise that a strong mix of expertise is needed in the port authority. As I mentioned, we have introduced new roles within the management team and retained external expertise to strengthen our commercial, safety, environmental and community engagement activities and plans. We also undertaking a review of the board to ensure that its make-up best reflects the needs of the port authority. Other action being taken includes the commencement of baseline health assessments of materials being transported through the port to assist in the current review of the ship loading circuit, which is being done by independent engineers; an independent engineering group to find permanent solutions to the only remaining returned conveyer on site that remains partially uncovered; and, a new program of community consultation is being developed with outside expertise. This is in addition to the ongoing process of strengthening and reviewing the board and the management structure.

In conclusion, I make it clear that the port authority welcomes the inquiry and other regulatory review processes that are now underway. We hope its findings will help us identify and adopt strategies and solutions that ensure there is no risk of this sort of event occurring in the future. In this task we are committed to working together with the port users, agencies and the community. Finally, I would like to suggest the inquiry considers as part of its review whether the state's entire port system might benefit from a coordinating body that ensures that all ports share information on these types of risks and management strategies so they are able to operate in an efficient and safe way as a possible. I have in mind particular common safety plans, economic modelling and

information from government departments, including access to relevant support programs and outside expertise. Colin Stewart will now make an opening statement.

Mr Stewart: Thanks, chairman. As CEO of the Esperance Port Authority for just on 23 years, I have seen the port grow from a very small operation employing approximately 15 people and handling about one million tonnes per annum of product through the port to where we are today, with a workforce of in excess of 90. That is a direct port authority workforce plus a number of other contractors. We are now handling in excess of eight million tonnes per annum.

My responsibilities in relation to the terms of reference of this inquiry have remained essentially unchanged during that period. Overseen by a board of directors, I have had overall accountability to facilitate trade through the port and to plan for its future development and be responsible for a safe, efficient and environmentally responsible operation. As someone who has lived permanently with their family in Esperance since 1980, having first arrived here in the early 1970s, I am particularly conscious that my job is to make our operation safe and environmentally responsible for those inside and outside the port. In terms of my qualifications, I am a fellow of the Chartered Institute of Logistics and Transport and I am an executive committee member of the Association of Australian Ports and Marine Authorities. I am also chairman of the Goldfields Esperance Development Commission.

I will briefly summarise the information contained in our written submission before Jim and I address the questions you have before us today. The inquiry's terms of reference cover a range of issues relating to the responsibilities of the port authority in relation to the handling of lead. The port authority has approached this task with a sincere commitment to act responsibly and to a high standard in the handling and exporting of lead. We were conscious from the first of the need to engage the Department of Environment and Conservation in confirming what changes would be required to the port's environmental licence conditions in order to handle the lead carbonate that Magellan planned to produce. We sent staff to visit the Magellan mine to inspect the operations and the product that it was producing. We further sent members of our staff and operational employees on a benchmarking visit to Port Pirie to gain an understanding of the issues and controls in the handling of lead in that operation and in that community.

[10.45 am]

We endeavoured to open lines of communication with the community stakeholders via open days, media releases and briefings of the port's community consultation group. The issues raised led to a strong focus, at both board and management level and, I would also add, at operational staff level, at ensuring occupational health and safety risks in particular were understood and addressed prior the handling of lead concentrate in the port. We engaged an occupational health and safety risk consultant to identify risks associated with the handling of lead concentrate and an occupational health and environmental physician to provide staff and management with advice on health issues. The port authority invested significant time, money and resources in establishing a new heavy metals regime with the aim of ensuring that there were appropriate controls in place. This included, among other things, a clean-dirty area for employees, blood lead level testing, enhanced personal protective equipment, a new heavy metals induction for all existing and new employees, as well as engineering improvements to the ship-loading circuit and to the storage facility. We believe that these new measures were working effectively, a view confirmed at the time by results of DEC inspections. The port authority's experience was that a strong focus by the port and the Esperance community around its iron ore operations had been recognised in it being named the Australian Port of the Year in 2003. It was committed to applying the same focus to the handling of metal concentrates. Indeed, since the commencement of the lead exports, the port authority has improved significantly the methods by which it handles all concentrates, from both an occupational and an environmental perspective.

The ACTING CHAIRMAN: Mr Stewart, can I just ask how much longer this will be, because you are aware that these pre-question statements need to be brief?

Mr Stewart: Another page, Chairman, and I am finished.

This involved improvements to the handling infrastructure and greater communication and collaboration with mine sites on appropriate moisture levels. Shortly before the first reported deaths, the port authorities had initiated a workshop to help the mining companies to consider the impact of their product beyond the mine site gate. We believe close links between the mines and the port are critical to ongoing improvements of dust management at the port. With the initial discovery of lead in some of the dead birds, the port authority board took immediate action, voluntarily halting all lead shipments on 12 March. I want to put on record that the port authority recognises and regrets the significant impact that these issues have had on the town, not the least because our employees and their families are part of that community. Before inviting questions, I would also personally like to thank the staff of the port authority who have supported the rapid growth of the port in accommodating new export opportunities for the state and have directed such efforts and energy towards developing effective, safe methods to handle lead concentrate. I particularly want to thank all employees for their great support and assistance during this difficult time we are all experiencing as Esperance residents. Thank you.

The ACTING CHAIRMAN: Thank you. I will now proceed to questions. We have a large number of questions. I indicate that we will get through as many as we can. We will table those that we cannot so that they are incorporated in *Hansard* and then send them to you, and I will talk about that again later.

You have talked about the role and responsibility of the port authority. Now, in hindsight, given what has happened, how well do you think the port has discharged its responsibilities?

Mr Stewart: I believe, and as has been evident with reports back from the department of environment, we have discharged those responsibilities well. Could we have done more? I think the inevitable answer to that is yes. But are we leaving stones unturned in an endeavour to further improve our operations? My answer would be: we are constantly looking at improving our operations. As recently as yesterday, we had a demonstration of a new dust suppression system. A company called Fogging Australia was in the port demonstrating to us its new product on how better to control dust. Literally, today if I had not been here, I would have been inspecting a new road room that the port's contractor is looking at using. We are constantly looking at how we can improve our operations.

Dr G.G. JACOBS: Mr Chairman, just an extension of that question, if I may. Mr Stewart, do you think the storage shed for the storage of bulk lead carbonate was consistent with the highest operational standards that you outlined in your press release of 31 August 2004 before the lead carbonate product was to be taken through Esperance?

Mr Stewart: The shed you are referring to, which was colloquially called the western mining shed, is one of the older sheds in the port. It has been through a number of recladdings in my time at the port. Prior to using that shed for the storage of lead concentrate from Magellan, the shed went through a complete resealing, by way of cladding any damaged sheeting and using foam and other ingredients to seal the shed. We worked very conscientiously to seal that shed up.

The ACTING CHAIRMAN: When the proposal was put to the Esperance Port Authority to ship lead, what effort was made by the port or yourself to assess the medical risks associated with lead poisoning?

Mr Stewart: Firstly, we fundamentally relied on external advice and government agencies. Like many people today, access to the Internet was certainly used by some of us, especially a number of our employees, but, rather than take advice off the Internet, we chose to use experts, be they clinical

physicians or occupational health and safety people. We sought our advice primarily from external experts.

The ACTING CHAIRMAN: Who provided medical advice to you about the effects of lead poisoning?

Mr Stewart: We used a Dr Galton-Fenzi, a well-known clinical physician. We used an occupational health and safety expert named Kim Riseborough. They were in the early days. As recently as a few weeks ago, we engaged Dr Peter De Marco, who has done further advice to our employees and to management. We have engaged a toxicologist, Professor Ng, from Queensland, who will be further providing advice to the port authority on these sorts of matters.

The ACTING CHAIRMAN: I do not recall seeing those documents as part of your submission. Can I ask, therefore, that you make available to us all advice that was provided to you regarding health matters?

Mr Stewart: Chairman, they are in the documentation we provided to the committee. They may not in all cases be in the written submission, but they have been provided.

The ACTING CHAIRMAN: We do have some boxes of material, so we will make sure that we extract those. What is your understanding now of the potential medical problems caused to adults to some degree, but more to children and pregnant mothers, regarding the effects of lead poisoning and the levels involved?

Mr Stewart: I am aware of the debate about what levels are considered to be a problem for those people in particular. I am not a medical person. I rely on the advice of the medical experts, but I have a broad understanding of those levels. As I say, I have family in the town who live within close proximity to the port. Obviously, I talk about that with my family in the sense of my daughter and my in-laws. Yes, I am aware of it, but I am certainly not an expert.

The ACTING CHAIRMAN: And the board is aware?

Mr Matijasevich: The board is aware of -

The ACTING CHAIRMAN: Has it been briefed on health complications potentially?

Mr Matijasevich: One of the reasons we have introduced Dr Michael Jackson - the name is easy to remember -

The ACTING CHAIRMAN: Are you aware that, in America, research has been done suggesting the potential damage that can be done in children with levels of one to 10 micrograms per decilitre?

Mr Stewart: I have briefly seen that information. I certainly have not read it. It has been brought to my attention in the context of the debate that is going on within the United States and other parts of the world as to what are acceptable levels.

The ACTING CHAIRMAN: Is it reasonable to assume that when you received the application for lead carbonate export through the port, you made yourself reasonably aware of the potential damage to the community if that lead dust were to escape from the port environment?

Mr Stewart: I believe we did.

The ACTING CHAIRMAN: Over what period of time was the Esperance Port Authority aware of the problems from the port associated with the export of iron and nickel?

Mr Stewart: We commenced a dust-monitoring program at the port at the time of the iron ore exports, which were in 1994. One of the ministerial conditions at the time was to set up a dust-monitoring regime, which we did, and we have been monitoring constantly for dust around the port since that time. Initially, that dust monitoring was focusing on obviously iron ore and nickel, but in recent times it has been increased to include lead concentrate or lead carbonate, and in more recent

times I have added sulfur to that. Sulfur in the sense that we have done some background monitoring of what are background sulfur levels in the town -

The ACTING CHAIRMAN: Sorry to interrupt, but my question relates more to how long have you been aware that you have been getting complaints regarding dust, particularly nickel dust, in areas outside the port.

Mr Stewart: We have certainly had complaints of nickel dust in times gone by. Like I have already indicated, that led us to continue to look at where that dust is escaping from and what we can do to improve our facilities. I could run through the improvements. There are many ongoing improvements that we are always looking at. The dust monitoring has shown up levels. We obviously reported those levels to the department of environment. We have never had feedback along the lines that there is a major problem with the levels that are being generated around the port. That is not to say that we are not conscious of the levels and that is not to say that we are not trying to do something about it, but to my recollection we have never had reports or feedback to the extent that there is a major problem with that.

The ACTING CHAIRMAN: I would like to briefly read from one submission in particular, but we have a couple of others that are similar. Just to summarise briefly, this says that the person has been complaining about nickel and iron ore dust and that large-scale exports started more than 10 years ago, and that the house had been covered in large amounts of iron ore and nickel dust, with the foul smell of xanthate regularly since then. He started ringing the Department of Environmental Protection in Kalgoorlie at the time. I gather that your licence states that no iron ore and nickel dust may leave the port boundary. The dust at that property was tested and found to be high in those materials and so on. There are other complaints, too. I gather there are recordings showing definite nickel dust levels prior to exporting lead carbonate.

Mr Stewart: That is correct. Our licence conditions fundamentally require us to ensure that no visible dust escapes from the port. We would contend that that is the case.

The ACTING CHAIRMAN: It specifically says visible dust?

Mr Stewart: It specifically says visible dust. Dust monitoring obviously demonstrates that there is some dust escaping from the port. As I say, we are conscious of that and we are constantly working to improve that. What levels of dust - and particularly in the case of the submission you have there, certainly if he is talking back when the department of environment office was in Kalgoorlie, he is talking back in the late 1990s. I believe particularly our iron ore circuit - because at that stage our iron ore circuit was not the circuit we have in place now; that was constructed in 2001-02 - is a lot more contained and I believe that the levels of iron ore dust have certainly dramatically reduced. As I say, with nickel dust, there has been a long history of nickel exports through the port dating back to 1967. Some of the dust monitoring, I think, is demonstrating that there has been nickel residue around the town for many years.

The ACTING CHAIRMAN: We have a statement here to say that there were letters from January to August 2004 stating that the nickel level in the rainwater tank was higher than the Australian drinking water guideline. This was just prior to the start of the export of lead. You had definitive evidence to show that, despite you being about to use the same closed system for lead that you have for nickel - and I gather the moisture concentration is virtually the same and that your process is the same for export - yet just prior to accepting a toxic substance for export, you had evidence to show that the substance that you were exporting in 2004 had escaped into the community.

[11.00 am]

Mr Stewart: That is correct, but at the same time, as I think I have already indicated, prior to us handling the lead we undertook significant improvements to our circuit and to our operations to, we believe, better control what dust emissions were coming out of the system. We significantly

increased the sealing of not only the shed, but also the actual loading circuit. We undertook a much more rigorous -

The ACTING CHAIRMAN: Can I get clarification? We are talking from August 2004. What specific things did you do? They might be what you are describing, but I want to be sure that we are talking about specifically from August 2004 when those levels were recorded to November, I think it was, when the approval - or even September, when you made the application. So between August and September, what specific things did you do at the port?

Mr Stewart: The way we approach these sorts of exercises is to set out an action plan of what needs to be done. Now when we started getting an indication that Magellan was interested in putting its product through our port, we started looking at what we would have to do to ensure that we managed the handling of that product to control dust. That action plan involved a whole lot of improvements. I guess it is probably contained in the submission, not in the written submission. If it is not, we can certainly acquire it for you. It was an ongoing program right up until the first train arrived. It kept going until the first ship arrived. The first train arrived in April; the first shipment went out in July. There was a constant program of improving our system, and that constant program has continued on past that. There are a variety of actions. I guess I could -

The ACTING CHAIRMAN: What was specifically wrong with the system in August 2004 that you have since rectified?

Mr Stewart: There are a number of areas we targeted. The most obvious ones are improving the enclosure of the system. We enclosed some extra conveyors that had previously operated without total enclosure. They had had roofs over them, but they did not have total enclosure. We certainly enclosed the extra conveyors.

The ACTING CHAIRMAN: But it is not totally closed now, is it, all the way out to the ship?

Mr Stewart: What we call the ship feed conveyer, which is conveyer three - we call it CV3 - still does not have a floor. There were other conveyors on site back in 2004 that had similar covers, but not total enclosure. We enclosed some of those conveyors. We went around with sealants and sealed up those conveyors that were already enclosed. We went around sealing any cracks or gaps. Others improvements, we have made since, or leading up to that time. We increased the length of the loading chute into the ship so that the product drops down into the ship. We increased the length of that to improve the length so that there was less fall of that product open to the atmosphere.

The ACTING CHAIRMAN: When did you do that?

Mr Stewart: That was post the first shipment. That was one of the projects we had on the action sheet of ongoing actions that we were required to do. We put in place on the ship loader itself what we call dust trays. They are trays that stop product falling off the conveyer belt onto the berth. We put trays under conveyor belts. There are a myriad many little tasks that the operational employers and the maintenance people undertook. As I said, the action plans that we developed were a better way of detailing the myriad things that we undertook.

Mr P. PAPALIA: Was one of the actions you took consulting with Riseborough and associates?

Mr Stewart: Correct.

Mr P. PAPALIA: The report states that longer-term plans to install catchment pans under the ship loader conveyors need to be fast tracked and that it is unlikely that these would be installed prior to the May 2005 trial shipment. It further states that consideration needs to be given to install temporary catchment systems over the harbour to prevent spillage entering the water. Did that happen?

Mr Stewart: The first shipment went out in July, is my recollection. It was not May. That gave us a bit more time. We did install some trays on the ship loader and we also trialled - what do you call

it? It sits along the side of a ship. It is like a shedder plate underneath the ship loader so that when the ship was being loaded, the shedder tray was alongside the ship.

Mr P. PAPALIA: Is that the temporary catchment system that is referred to?

Mr Stewart: That was any or the majority of product that was potentially spilling into the sea floor or ocean was shedding back onto the berth so that we could clean it up.

Mr P. PAPALIA: The ship loader conveyors that we looked at last night do not have catchment pans underneath them.

Mr Stewart: Up on top deck? Certainly the CV3 does not, the big, long-feed conveyor -

Mr P. PAPALIA: Was that used for lead carbonate?

Mr Stewart: Correct.

Mr P. PAPALIA: And it does not -

Mr Stewart: It does not have a floor. Correct.

Mr P. PAPALIA: It also states in the report that installation of the vacuum system piping to the ship loader is a priority.

Mr Stewart: Correct.

Mr P. PAPALIA: And that spillage on the ship loader can be cleaned easily using the vacuum system. Did that happen?

Mr Stewart: It did.

Mr P. PAPALIA: One other thing regarding the report: it says that the operational integrity of the transfer conveyor system was unknown as it was not operational at the time of inspection. Was the fact that he as your consultant had not had the opportunity to assess the system a concern for you?

Mr Stewart: I am trying to get my mind around what he was talking about when he mentioned the transfer conveyer.

Mr P. PAPALIA: Was that going from the shed to the ship loader?

Mr Stewart: I think that is the conveyer that is coming out of the shed onto the main ship loading circuit. It was certainly one of the areas that was repaired and looked at. I need to take on notice exactly what he is talking about.

Mr P. PAPALIA: It goes to the heart of how much consideration you gave to preparing your system for transporting the toxic material lead carbonate, a fairly dangerous material of nickel that had been transferred before. You knew that you had problems with nickel and you got a consultant in to advise you on actions to take. However, one component of the system was not operating when he assessed it.

Mr Stewart: I have no doubt in my mind that that issue was addressed. I am recalling some of the actions we took which involved engaging extra casual staff to specifically go through the system and do a lot of the work that I have been outlining. We put on extra staff to help us improve the system.

Dr G.G. JACOBS: Colin, can you provide us with some of incident reports over the past 18 months since the export of lead carbonate through the port in order for us to gauge some of the issues of spillage of this product from your loading infrastructure?

Mr Stewart: Those reports you are talking about and, I guess, our shipping logs, all have been provided in the documentary evidence we sent to the inquiry. They are not in our written submission, but they have all been provided. Perhaps to give you a bit of flavour of what they are, shipping logs are detailed logs kept by our cargo supervisor, the person in charge of loading the ship. Prior to the loading of the ship, our shipping officer, the gentleman who showed you around

yesterday, does a detailed presentation to the persons in charge of loading the ship as to what to expect with the cargo. He does a prior assessment of the moisture level of the product before it goes on to a particular ship and advises the operational staff as to where there may be potential problems and how to manage them if they arise if and when we start loading. To pick up on comments made by Magellan earlier on, our early experience with the Magellan product was certainly that it was a good product to load. Very little dust flowed very freely and the general consensus of all employees was that it was a good product to handle. Having said that, we had rigorous procedures in place. There were certainly two shipments that caused us problems whereby the procedure is if visible dust is noticed, people immediately shut down, and that was the process that was followed in my view rigorously by our operational people. Loading is not recommenced until we believe we have addressed the problems and can ensure that the product can be handled without dust.

Dr G.G. JACOBS: As a supplementary to that question, I refer to your shipping manager. You talked about assessment of moisture and the product and whether he would decide if it was too wet or too dry. What assessments does he use other than a subjective one? Are there other ways of assessing? I put it to you that it is probably not good enough to proceed, find that it is dusting and that it is too dusty, and then stop. That contributes to the dust already in the environment. In this day and age waiting for it to happen and then ceasing is probably not the most favourable course of action.

Mr Stewart: He adopts a couple of ways of assessing the level of moisture in the product. First, as he explained on your visit last night, there is a shipper's declaration. In other words, before the product can be loaded onto a ship, the ship needs to know what the anticipated moisture level is. That is in a legally binding document that is not prepared by us; it is prepared by the cargo owner. That shipping declaration spells out that -

Dr G.G. JACOBS: That is provided by Magellan.

Mr Stewart: By Magellan.

Dr G.G. JACOBS: That is a moisture level that is determined 950 kilometres away.

Mr Stewart: The declaration is prepared by the shippers as to what the ship can expect that product to be by way of moisture. That is the first thing that the shipping support officer would refer to. We would also go into the shed, take samples and put them through our normal moisture determination process. That involves taking a sample away, putting it into an oven and cooking it effectively over a predetermined period, and by doing the calculation you work out the moisture level. We have a process in place to predetermine the anticipated moisture level. That is not the whole stockpile - granted. It is a sample of some of the stockpile. However, it gives us a good feel of what the moisture level of a product is going to be when it is being loaded. You have to appreciate that when we load a ship some of that product could have been in the shed for anything up to four or five weeks. In some cases, especially in summer, some of that product has dried out. We are aware of that. We are aware of what areas in the shed there could be product that is drier than the most recently received products. That is all part of what we endeavour to do to manage the dust levels.

Dr G.G. JACOBS: How long does the process take by which you ascertain or assess how much moisture is in the concentrate? If you find that there are areas that are very low in moisture, that is very dry, what happens then?

Mr Stewart: When and if it is found - it maybe prior to shipment or during shipment we find that we have got into an area than is drier than we would normally like to handle - we have a couple of mechanisms of addressing that. One is literally going in and getting water onto the product. That can be done with hoses and whatever. We will also -

Dr G.G. JACOBS: Sorry, you just hose the pile down, do you?

Mr Stewart: We add moisture. It is as simple as that. The reality with handling nickel concentrate and lead concentrate is that the three most important things are moisture, moisture, moisture. If we have problems with concentrate, the first port of call is to get more moisture into it. The second thing we will do is, if we are loading a ship and we get a dusty product, we will stop loading and await the arrival of the next train. Given that we more often than not know that with the more recent trains, if a train is on its way down, it is more likely to be up around the nine per cent, maybe it has lost some moisture because it has been in the shed. We will get that product into the shed and blend it with the dry product. We literally get in there with front-end loaders and mix it all up. In the two dusty incidents that we experienced, that was the process that the operational staff not only carried out, but also were obliged to carry out to make sure that we got the product back to a moisture level that we believed we could safely handle it.

[11.15 am]

The ACTING CHAIRMAN: I think the member for Bassendean has a question on the same issue.

Mr M.P. WHITELY: Yes, it is and it has partly been answered. It seemed to me from the inspection we did yesterday that it is hardly a homogeneous product. Are you telling us that the dust incidents occurred and then you stopped the process?

Mr Stewart: Correct.

Mr M.P. WHITELY: That is a bit like shutting the gate after the horse has bolted, is it not? If the dust has been out there -

Mr Stewart: What we are talking about is visible dust, and what we are obliged to do is make sure that no visible dust escapes the port boundary. That is our licence condition. As soon as our operational people see dust escaping from the shipping circuit, we stop loading.

Mr M.P. WHITELY: But if you are obliged to make sure that none escapes it and you are seeing dust, and the only evidence is after the event, you are not meeting your obligations.

Mr Stewart: No, our obligation is to make sure it does not escape the port boundary.

Mr M.P. WHITELY: I know, but if you are seeing dust produced -

Mr Stewart: That is when we stop.

Mr M.P. WHITELY: - after the event, it is too late.

Mr Stewart: It has not escaped the port boundary at that stage; it is still within the port precinct.

Mr M.P. WHITELY: How do you control it, then? Surely prevailing winds would blow it in whatever direction they are blowing.

Mr Stewart: What I am trying to explain to you is that there are a number of areas where we will see dust escape off the circuit: one is obviously as it drops into the hold. If it starts dropping into the hold, that is where it is free-falling through the atmosphere. If the guys start seeing dust being generated - and we have a person on the ship over the hold monitoring the loading, actually controlling the loading - if he sees dust starting to be generated as it drops into the hold, he will call up his supervisor and say, "We are generating dust; we need to stop" or "We need to add water" or whatever. That is standard operating practice. There are other parts of the circuit - the CV3, the main shipping conveyor; if the belt is going over what we call the tail pulley, as it comes back around, there is a potential for dust to be generated there. If the personnel see dust being generated there, they will call the supervisor and say, "We need to stop." That is our standard operating practice.

Mr T.K. WALDRON: Following on from that and the make-up of the concentrate, following the change in the agglomeration being transported down from the mine, were you concerned at the different form and did you notify the Department of Environment and Conservation of that different form, or the Department of Health or the local community?

Mr Stewart: In our opinion, from day one we were handling a metal concentrate - a lead concentrate. The agglomeration process, as explained to you earlier today, was an added process that Magellan was going to endeavour to introduce to enhance moisture control. As was explained earlier, we were really, in our own mind, talking about a metal concentrate. We went to the mine, we saw the product, and our operational people came away and said, "This is really a metal concentrate; no different from any other concentrate we handle."

Mr T.K. WALDRON: That different form that came after a couple of loads did not concern you?

Mr Stewart: To us it did not materially change what we were handling. What we were handling was concentrate.

Mr T.K. WALDRON: So you saw no need to report that to DEC or health or the local community?

Mr Stewart: No.

Mr T.K. WALDRON: Talking about the DEC inspectors, you were just talking about how you have a person looking over the ship. You talked earlier about how they come and inspect. When they come and inspect, do they thoroughly inspect or do they go into the shed or do they go into the loader?

Mrs D.J. GUISE: Can the witnesses please explain the process for when they do come and inspect?

Mr Stewart: Generally, we are given advice that they will be coming to town a few days in advance, and in recent times they have endeavoured to make those visits coincide with the loading of a ship, be it a nickel ship or a lead concentrate ship. They arrive and generally report directly to our environmental officer, and then they are escorted around the site. I think the most recent visit was back in February and some environmental health officers from the shire accompanied them. They are escorted around the site by our environmental officer. They have free and open access to wherever they want to go.

Mrs D.J. GUISE: Where precisely?

Mr T.K. WALDRON: Where do they go? On their visits, have they gone into the shed? Have they gone out to where it is actually loaded? Have they gone and looked at that?

Mrs D.J. GUISE: We want to know precisely where they go.

Mr Stewart: I would have to take that on notice if you want it absolutely precisely. My environmental officer accompanied them. I was not actually in the port for the last visit; I was in Perth. My general report that I have had from my environmental people is that they go down onto the site and they certainly walk around the shed and operations. To my knowledge, they certainly have not been on board the ship, and they certainly have not been into the shed.

The ACTING CHAIRMAN: The report that we had in our questioning of the Department of Environment and Conservation was quite surprising, I have to say, and talked about the number of times that the DEC inspectors had been in approving your licence and suggested that they were not aware that this agglomeration process had stopped and that the inspector had not entered the shed to look at the product and had not been on the ship to see the product, so he thought that it was still an agglomerate. This is the latest licence renewal just late last year. Given the fact that when we went last night, over a two-hour period we had an induction, we went into the shed and we inspected port facilities. I am advised that the inspector was there from roughly 9.00 am to 5.00 pm on that day. Do you have any knowledge of what the DEC inspector did and how they were able to not know that you had changed from this so-called agglomerate back to just a lead concentrate?

Mr Stewart: What they actually did on site I would again have to take on notice, and my environmental officer could give you more detail, but they certainly spent time in and around the

shipping circuit. As I recall, they drove onto the wharf to get as close to the ship as they could without physically going onto the ship, and the reason I am aware of that is because under normal operating practices, people are not allowed to drive onto the wharf.

The ACTING CHAIRMAN: Is the product visible from where they would have been standing?

Mr Stewart: No.

Mrs D.J. GUISE: Are the loading procedures visible from where they would have been standing?

Mr Stewart: Loading procedures as in?

The ACTING CHAIRMAN: Unloading the kibbles?

Mr Stewart: They certainly could have seen the kibbles being unloaded, yes.

Mrs D.J. GUISE: And then from the conveyor onto the ship? Were they able to see the product going from the conveyor onto the ship?

Mr Stewart: No, because it is fundamentally in an enclosed conveyor.

Mrs D.J. GUISE: It is a bit pointless in terms of approving the licence, then, is it not?

Mr Stewart: The licence conditions contain a lot of - the issues that we are inspected on are basically - our environmental licence has a series of conditions and I cannot tell you how many but they are categorised into dust prevention measures and a whole range of measures that we are inspected on. The actual nature of the product - and I am well aware of the debate about whether it be pelletised or granulated - is only mentioned in the preamble of the licence, and it is not mentioned in the licence conditions, so they would have not, under normal circumstances, inspected us on the basis of what the nature of the product was. The product for them, from our point of view, was a lead concentrate. We were not inspected specifically on whether it was an agglomerated lead concentrate or a granulated lead concentrate or a pelletised lead concentrate.

Mrs D.J. GUISE: Mr Stewart, would they or would they not have inspected on the basis of possible dust emission escaping?

Mr Stewart: Correct.

The ACTING CHAIRMAN: We have jumped ahead to a different section, thanks to the member for Wagin's question. We will come back slightly. The member for Wanneroo had one about complaints.

Mrs D.J. GUISE: You obviously were aware of problems in relation to the export of iron and nickel and subsequently lead. Are you able to advise how many complaints have been received - and these include from the community? Do you keep a log of these complaints; and, if so, for what period?

Mr Stewart: The answer is yes, we do keep a log of all complaints from any source for whatever reason. I am pretty sure we have included those in the documentation. I would have to double-check and if we have not, we can certainly get them and make them available for you. How long do we keep them? We keep records in accordance with the normal state records requirements, and we archive them after a certain period.

The ACTING CHAIRMAN: Still on the issue of complaints, another submission received states the following -

> We have had a boat moored in the Esperance Bay Yacht Club Marina at Taylor Street for the past two years. During that time we have spent many hours cleaning the boat of Iron Ore and Nickel dust (and I presume lead dust) only to come back the next day and have to do it all again. We have now repainted some of the boats surfaces grey as the dust had stained most of the white surfaces and it became pointless to try and keep the boat white.

> We have been on board the boat in the marina on many occasions while a ship is loading and observe dust billowing out of the open holds of ships on both berths and blowing across to the marina and the town.

Would you like to make a comment on that submission?

Mr Stewart: Firstly, I reject that we have dust billowing out of ships' holds, particularly the iron ore and nickel vessels. If there was dust billowing out of those holds - billowing can be used as a bit of an emotive word - we would have shut down. That is our procedural requirement. Is there potential for dust from those operations to end up in the marina? There certainly is. What are we doing about that? Since that complaint was received, and we received that similar complaint, we have had installed a high-volume dust collector over there to analyse what dust is being generated that is getting over to that part of the town.

The ACTING CHAIRMAN: And what do those monitors say to you?

Mr Stewart: We have not got those results back yet. These are high-volume dust monitors that require fairly sophisticated analysis so they are sent away. Effectively, a high-volume dust collector is a vacuum pump that is pumping air, pulling a defined amount of air through the sampler, across a defined area of specialist paper and then that has been to be sent away and analysed. I would have to take that on notice to tell you just where that dust -

The ACTING CHAIRMAN: How long has that been operating?

Mr Stewart: Again, I would have to take that on notice.

The ACTING CHAIRMAN: Roughly?

Mr Stewart: We got high-volume dust monitors and we brought some down into the town in February when we started getting complaints of that nature.

The ACTING CHAIRMAN: You have had in the past dust monitors showing elevated lead levels, have you not?

Mr Stewart: Correct.

The ACTING CHAIRMAN: When?

Mr Stewart: I am looking at our dust report that we would have sent off to the DEC. February 2006 was a significant dust event. I am sure we are going to question that. It took us some time to get the results of that particular dust gauge. In May 2006 we had a high reading but, as we point out in our dust monitoring report to DEC for August 2006, when we shipped particularly high tonnages of lead through the port, or at that stage over 16 000 tonnes, which was a fairly high level for a month, we actually had very low levels. We have had levels that have varied through the period of our monitoring - sometimes up, sometimes down.

The ACTING CHAIRMAN: Sure, and changing environmental conditions will do that, but surely that says to you that in May 2006 you were aware that some lead dust - whatever the quantity, sufficient to show on that dust monitor - was still escaping from the port.

Mr Stewart: Correct.

The ACTING CHAIRMAN: You have indicated that you are aware of the potential health issues relating to lead dust. Surely that would have rung enormous alarm bells.

Mr Stewart: The answers to your questions are yes to all of them. What did we do about it? As soon as we became aware of those elevated levels, we immediately brought in high-volume dust samplers and put them in to try to get a handle on what was happening. Another important ingredient in all this is that we have been working since 2002 with the Department of Environment to develop an air quality monitoring program. One of the difficulties I have as CEO, and I certainly know that my environmental officer and a number of other environmental officers around the port

scene are frustrated with what do these dust levels actually tell us. What do they actually mean by way of dosage? Are those levels that we are finding in those dust gauges indicative of high dose levels to the population in general? There is an air quality monitoring program that DEC and ourselves - and it is my understanding the Department of Health through DEC - have been working on collaboratively to -

[11.30 am]

The ACTING CHAIRMAN: Colin, we are running short of time. I need you to try to condense your answers.

Mr Stewart: What I am saying is that going back some time now, we have been working with DEC to develop an air quality monitoring program, which is not a dust management program. It really considers what the dust levels really mean. In scientific jargon, there are a variety of dust monitoring guidelines that have a variety of interpretations. What we have been trying to work through with DEC is that, yes, we are generating dust. However, what does that really mean by way of impact on the people of Esperance and impact on the environment? As I say, we started that program back in 2002. As recently as a couple of weeks ago, we were told by the department of environment that the air monitoring program that we have been working on jointly with them is still not available for us to comment on.

The ACTING CHAIRMAN: I want to discuss visible versus invisible dust. I mention that through personal experience. Living downstream from a residential development, I get constant volumes of dust on my property with no visible dust coming off the site opposite, even though there is no alternate source of dust. When we went through the safety induction procedure with you - it was the same at the mine - it was fairly obvious that while there was concern for visible dust, there was also significant concern from an occupational health and safety viewpoint of dust that is not able to be seen. That dust is still present. Given that dust has gone out of the port, despite you closing down when there is visible dust, does that not strongly suggest to you that the dust that is causing the pollution to the people of Esperance is not visible?

Mr Stewart: I have to agree that that is a fair assumption. We quite frankly are still trying to come to terms within our own operational sense with exactly what is going on; hence our desire to get these high-volume dust samples in place as soon as possible. We have some in place. We are investigating as we speak the installation of real-time dust monitoring that can pick up these sorts of dust levels. To answer your question, I think it goes without saying that we now all appreciate that invisible dust is one of the issues we are grappling with down here.

The ACTING CHAIRMAN: Is it true that the port does not have loading chutes that allow for the loading of product into different sizes of ships to be fully enclosed?

Mr Stewart: Have loading chutes?

The ACTING CHAIRMAN: I guess the question relates to different sizes of ships when you are loading. You are not able to seal the direct loading of those, therefore providing an opportunity for dust that is not visible to escape from ship during the loading.

Mr Stewart: I think what the question is referring to is when we have a particularly beamy ship. What has happened on occasions is that in order to be able to load that ship we have had to effectively lift the ship loader from a vertical position up to a 45-degree position - probably not even 45 degrees - but lift it so that we are shooting the product into the ship's hold rather than dropping it into the hold. We have addressed that by increasing the length of the chute, as I said earlier on in my evidence.

Mr P. PAPALIA: The three-monthly air monitoring results are required to be collected by the authority under its licence and reported to DEC annually. Why was the report provided on 31 October 2006 incomplete?

Mr Stewart: Absolutely fundamentally because we were let down by the laboratories who do the work for us. We have been using a laboratory called ARL to do all our environmental monitoring. They subcontracted out that work to CSIRO.

Mr P. PAPALIA: So they did not get back to you in time?

Mr Stewart: They did not get back to us in time?

Mr P. PAPALIA: Why did you not use another provider?

Mr Stewart: Primarily because once you start an annual environmental monitoring program for scientific analysis, it is best if you stay with the same company for the period; in this case it was four separate rounds of monitoring. It makes good scientific sense to use the same laboratory. We have since ceased using that laboratory, because once they let us down as badly as they did, we immediately went and looked for another laboratory.

Mr P. PAPALIA: What responsibility did your authority have to monitor and act on the reports throughout the year before you had to report annually?

Mr Stewart: Can you repeat the question?

Mr P. PAPALIA: You have to report annually to DEC on your results. What responsibility did you have to monitor and act on the reports that were received in the course of the 12 months prior to the time of your report?

Mr Stewart: If we noticed trends in the dust monitoring results, trends that were suggesting that we were having particular dusty problems, I guess the pertinent point is that as soon as we received the results of February 2006 - I am well aware that they were well after they should have been received - we immediately took action to introduce more sophisticated monitoring through the high-volume monitoring to, again, try to get a handle on what was happening. We went back and reviewed our shipping operations to see how these dust events might have been generated.

Mr P. PAPALIA: The onus is on you to report to DEC those recordings that are outside the norm prior to the annual report?

Mr Stewart: Only on an annual basis, but we would bring it to their attention.

Dr G.G. JACOBS: The level at Taylor Street of February 2006 was 42 milligrams per square metre for 30 days. Putting that into perspective, it was an obvious high, elevated result. Are you telling us that there is no onus on you other than to put it in an annual report that is submitted towards the end of the year and not flagging that result to anybody? Is there any onus on you to alert the DEC to that 42 milligram result, or are you required only to shove it in a report and wait for them to have a look at it towards the end of the year?

Mr Stewart: My recollection is that that high level - are we talking about February 2006?

Dr G.G. JACOBS: That is right; at Taylor Street.

Mr Stewart: That was the problem we had in getting that information back. By the time we got that information, it was my recollection some time after our annual report had gone in. I would have to take that on notice to double check that.

The ACTING CHAIRMAN: Are you saying from February through to your annual report at the end of the year?

Mr Stewart: Yes. Our annual report is meant to go in in October. We sought an extension because we were having trouble getting the reports back from the laboratory. As I say, in this case it was CSIRO. It was not until, I think I am correct in saying, early January that we finally got those results back, so almost 11 months later.

The ACTING CHAIRMAN: Colin, that is fairly mind-boggling. From our discussions with Magellan and looking at one of its reports, I am fairly certain that it gets reports back on lead levels

from dust in its static dust monitors in about three days. You waited 11 months, at the same time that you were getting complaints from the public to say that there was dust.

Mr Stewart: Our monitoring is somewhat more sophisticated in the sense that we not only sample for lead; we sample for lead and iron ore, or hematite as it was, for nickel and for sulphur. We are sending off a sample and they then have to effectively, in this case, subcontract some of that out to another laboratory to do that analysis.

The ACTING CHAIRMAN: Given that you are exporting iron ore, which is relatively harmless, nickel that has milder problems and then an extremely dangerous substance, surely you would get on the phone to the laboratory and say that you need the lead results straightaway because you are getting complaints.

Mr Stewart: We did exactly that with many phones calls. We have an email trail - I have looked at it - that is in the vicinity of 20 emails. We followed it up constantly. Rest assured, we did not just sit on our laurels and say that we would wait until it arrives. We were following it up. It was an aberration. We had never had that sort of difficulty in the past.

The ACTING CHAIRMAN: Have they given any explanation as to why they could not do it in the three days it seems to take somebody else?

Mr Stewart: I do not know that we normally get a turnaround in three days. I would have to check on that. On this particular sampling exercise, the particular laboratory lost some of our samples that we were looking at for iron ore. We do not know whether we will ever get the actual analysis for iron ore. Is that acceptable? It is totally unacceptable. Was it in large part beyond our control? I would argue that it was, because we in good faith provided to the laboratory that had previously provided us with performance. This particular time the laboratory chose to subcontract it out to CSIRO. We had a lot of trouble getting those results.

The ACTING CHAIRMAN: What time would it normally have taken to get a result?

Mr Stewart: To give you an accurate answer, I would have to take that on notice; but I would have thought about a month to six weeks would be pretty standard.

The ACTING CHAIRMAN: Why then did you not change contractors after two months when it was obvious that you were having difficulty?

Mr Stewart: Firstly, those samples had gone to CSIRO. It was a matter of getting back from CSIRO and handing them on to another laboratory. The advice is that, as I have already answered, on an annual basis when you are monitoring for four different periods of the year, the scientific process is that you should use the same laboratories so you get the same sampling techniques and the same analysis.

The ACTING CHAIRMAN: Sure, but with respect, Mr Stewart, when you are handling a substance as potentially dangerous as lead, the normal scientific process does not count.

Mr Stewart: I accept your comments.

Dr G.G. JACOBS: As a supplementary, Colin, there was a problem in February 2006 at the Taylor Street tearooms. There were some results in May that were also high on Bostock Street and Taylor Street yet again. Are you telling us that it also lost or somehow delayed on those results too, or was that given to you in a shorter time?

Mr Stewart: I would have to take that on notice, Graham. I think it is all tied up with the same problem, but I would need to take it on notice, if you would not mind.

Dr G.G. JACOBS: What results were not available when you initially submitted the first annual report? Was it the February 2006 result or was it both February and May?

Mr Stewart: Again, I will have to take that on notice. I think it was primarily February, but it may have been February and May. I am trying to look up my notes.

Mr P. PAPALIA: Would you comment on the proposition that the land-based dust monitors used at the Esperance port are inadequate to monitor the emissions into the environment of Esperance, because with strong winds the fine particulates of lead carbonate can disperse into higher atmospheric layers before descending some kilometres away?

Mr Stewart: Our dust monitoring program is a program that we did not develop in isolation. We developed that program in cooperation with the department of environment. It is well aware of our monitoring program. Certainly, there are more sophisticated techniques of monitoring these days. High-vol dust sampling is one of them. We have used them before in the port. We are now using them. I was in contact as recently as last week with KCGM, Kalgoorlie Consolidated Gold Mines. They have an extensive experience with using those types of dust monitoring and we will be working with them to get a better appreciation on better dust monitoring techniques. We will develop those techniques not in isolation; we will develop them with the department of the environment.

Mr P. PAPALIA: Your environmental management plan calls for maintenance of an abnormal dust event register. Did you forward that to us?

Mr Stewart: I thought we had. We do have an abnormal dust -

Mr P. PAPALIA: I have not seen all of the documents.

Mr Stewart: As Dr Purdy suggested, there are two or three boxes and quite a lot of information in those boxes.

[11.45 am]

Mr T.K. WALDRON: Colin, reports have been received that after emptying, kibbles were washed in open areas on the port. Is this true, and can you tell us what happened with the washings? In line with that question, how do you explain the high level of benthic lead and nickel levels on the seabed? If the reason for lead in the harbour is due to flooding of the wash-down sump by the storm in January, why had this not been cleaned in preparation for that bad weather, if you had that notice?

Mr Stewart: No, there are no kibbles washed down in the port itself, so that does not happen.

Mr T.K. WALDRON: That does not happen?

Mr Stewart: No.

Mr T.K. WALDRON: That is good. What about the high benthic lead and nickel levels on the seabed?

Mr Stewart: The port authority voluntarily commenced a program in 2002, whereby we started monitoring of the sea floor. When I say "we", we engaged a company called Oceanica, which now does regular monitoring of our sediments on the sea floor. Particularly we target two areas. We target the area where the vessels are being loaded, because if you are going to expect contamination, it would be in the berth pockets as we call them. In this case, it is particularly berth pocket No 2, so we sample that area and, as I say, that started in 2002. We also sample outside the harbour area with the intention of understanding that if we are getting some contamination in the berth pocket, is that migrating out of the berth pocket into the broader harbour area and out into the broader environment? That is basically our sediment monitoring program. The major storm event on 4 January this year, for those Esperance residents who were here at the time, was a significant storm event. I was in the main port area, which is where we were yesterday, when the storm was at its height and I can assure you that the road that you gentlemen and ladies walked along was a river. There was water flowing everywhere. Yes, product that was in our sediment trap would have inevitably flowed out of that sediment trap into our interceptor pits and then into our stormwater system.

Mr T.K. WALDRON: I realise that was really something out of the ordinary. Do normal storms cause a similar problem?

Mr Stewart: With normal storms, we would not expect that sort of impact. Having said that, one of the problems that we, as management at the port, are having to address is that the bulk of the facilities at the port in terms of wharves - No 1 wharf and No 2 wharf - were built in the 1960s and 1970s. In that period, engineering practice was that you built the wharf with a slope towards the water, so if anything fell onto the wharf, it went into the water. That was how they were designed. If you were designing a wharf today, you would slope it backwards. Our stormwater systems and the like were just straight out into the ocean. They are the issues that we have had to address. We have installed a series of what we call interceptor pits along our stormwater system, and they were installed in 2001 to trap the stormwater in interceptor pits before it goes into the ocean. That is like a large septic tank with baffles in it, so it slows down the speed of the water and it drops, in large part, the heavy metals out. We have been taking increasing steps to improve the stormwater control in the port. The sediment trap that you people saw yesterday has been complemented by a bigger sediment trap down at the back of the port, which gives us effectively overflow capacity whereby we can take product out of there and take it down into the bigger sediment trap until such time as we have enough to send back up to the mine.

Dr G.G. JACOBS: Colin, the chairman of the board in last Friday's local paper has now attributed the high benthic levels, or seabed levels of lead in the inner harbour, particularly at sites 8 and 9, which are the inner harbour berth pockets, to the major flood event. You had a report done by Oceanica, the marine and estuarine specialists, which is dated April 2007. In its table 1, the benthic levels are clearly well above the interim sediment quality guidelines. How do you explain the very high levels in October 2006, which was clearly before the flood event? To get it in perspective, the ISQG levels for lead are a lower limit of 50 and an upper limit of 220. The levels on this table, particularly in berth 9, ranging from 360 to 4 500, are clearly well before the flood event.

[Interruption from the gallery.]

The ACTING CHAIRMAN: Excuse me. Please, I have made the comment before. People from the gallery are not permitted to make comments. We have welcomed submissions and the submissions have referred to this issue. Please do not interrupt the proceedings. Thank you.

Mr Stewart: Firstly, I go back to my fundamental point. The Oceanica sediment monitoring was a project that we put in place to monitor our operations. What that was telling us was that we were getting some spillage into the berth pocket. We do not resile from that one iota. We are aware of that. What do we do to take steps to improve our operations so that was not happening? Since that report, we have put a kerbing along the whole berth face on No 2 berth to stop stormwater going into the ocean. Is that the only method by which product can get into the ocean? No. We had a recent experience in maintenance mode; in other words, when the ship loader was having some work done on it by maintenance employees. Inadvertently, an amount of, I guess, in this case it was probably nickel concentrate because we have since stopped handling lead, a piece of material had been caught up on the conveying system somehow. When they lowered the boom down, it fell into the water. We reported that to the agency, so it does happen.

Dr G.G. JACOBS: Has any lead fallen into the water?

Mr Stewart: It could have happened, Graham, yes. I am not saying it has not happened, but the chairman in his advertisement or information to the Esperance public, we were specifically responding to the fact that the high levels identified by the department of environment - I think there were 28 000 or 29 000 - were at a specific location at the stormwater outfall under No 1 berth. There were very elevated levels; much, much higher than anything else we have ever seen. We were specifically referring to, in the way we were putting our release out, that was an aberration and that was an aberration generated by the storm. We have since, as required, commissioned Oceanica to do a far more detailed study of exactly what level of contamination there has been since our last

study, which was, as you rightly pointed out, last year because we do this on an annual basis. We brought that forward in light of the current interest in what has happened with lead.

Mr P. PAPALIA: You are suggesting that the storm resulted in contents of the interceptor sump being washed into the ocean adjacent to the water.

Mr Stewart: Some of it, not the whole lot of it. Some of it would have overflowed out of that. There are two things: there is the sediment trap and then there is the interceptor pit. It would have bypassed both of those.

Mr P. PAPALIA: Your environmental management plan calls for regular cleaning of the interceptor sump. It does not state a time frame. How much in advance of that storm was the sump cleaned?

Mr Stewart: I would have to take that on notice. What we have now is a regular - we have a program called Advantis. It is a maintenance program. That regularly generates work orders, and that work order - I cannot remember whether it is on a monthly or two-monthly basis - generates that those pits need to be checked.

The ACTING CHAIRMAN: I have to say that it surprised me a little last night when we were looking at that first pit. There was obviously some material present, and when we asked how often it was cleaned, it seemed to me that the answer was reasonably vague in terms of the time period and frequency of cleaning. That storm was fairly well predicted as I understand it. You would think if there were a risk of lead product being there and being washed onto the ocean bed, that would have required remedial action prior to the storm.

Mr Stewart: I take your point and your point has been recognised internally. We have, since that storm, developed a pre-storm process, for want of a better description. That storm certainly focused our attention on the exact matters that you are raising. Could we have done it better at the time? Yes, that storm was well predicted. Was it going to be as big a rain event as it turned out to be? I do not think any of us would have envisaged - I certainly did not envisage - a rain event of that nature. The town lost four power generators out of that rain, purely because the rain was so strong that it caused the gas turbines to ingest large amounts of water, which caused them to cavitate and be terminally damaged. That is a very rare event. Nobody was expecting the volume of rain that we experienced.

The ACTING CHAIRMAN: There was something else that surprised me, and that is when you look through the process, the kibbles are taken off the trucks and are unloaded into the chute. There is obviously a vacuum extraction procedure there. There is some minor degree of spillage on that site. My understanding is that at the conclusion of unloading a lead shipment, and you do not do it every day - how often would you get a lead shipment in roughly?

Mr Stewart: When the lead trains are running, we have a joint heavy metals train every day. That is bringing in nickel concentrates down from Black Swan -

The ACTING CHAIRMAN: The lead I was referring to.

Mr Stewart: We had a train every day. We would not necessarily have had lead on that train every day, but certainly two or three times a week.

The ACTING CHAIRMAN: At the end of unloading that train, you washed down the area that goes into that little sump area. Surely, rather than just leaving the lead lying in that sump, it would be routine practice at the end of that shipment, whether it was a shovel full or a bucket load, to go and clean up that lead concentrate that is just lying on the ground. It is covered in water, so it is not going anywhere, but surely that would have been more appropriate action.

Mr Stewart: Our judgement was that it was cleaned up when the sediment trap was full, and that was monitored by our operational staff.

Mrs D.J. GUISE: I would like to get a better understanding about this particular area in terms of dust emission and because it is in the area of the wash down and sediment trap. I am referring to the mineral concentrate guidance and development of your health, safety and environment management procedures, specifically in relation to 4.4, "Inloading by Rail". I note that yourselves, the supervisor and the mineral concentrate owners, as well as the contractors, are all users of this particular document. It states that no more than three kibbles are to be untarped at any time. This is to prevent odour and, I assume, spreading of dust in prevailing winds. I assumed, while visiting last night, that one kibble was untarped at a time and taken to the hopper. This is part one of the question. Can you please advise what is current practice in terms of your lead carbonate and the unloading of those kibbles? Is it one, two, three or more that are untarped at a time?

Mr Stewart: There generally would be up to three untarped at a time. The untarping of the tubs one at a time was primarily to control odour, because we did find that as we untarped each tub, we would get odour escaping. One of a number of methodologies was to untarp only when you are ready to actually tip it into the receival hopper. The untarping was mainly aimed at odour control, not dust control.

Mrs D.J. GUISE: So if there are up to three sitting there untarped, for what period of time would they be sitting there until they go to the hopper?

Mr Stewart: Minutes.

Mrs D.J. GUISE: What happens when the product cannot be unloaded via the hopper due to the hopper failure or product problems? I am specifically asking this in terms of the product sitting there and also because if dust is emanating, it reflects on the wash-down area as well, which goes to the previous question about sediment. What do you do when that hopper fails or there are product problems?

[12.00 noon]

Mr Stewart: Firstly, that hopper is well maintained. I am trying to remember when it would have been brought to my attention that it had failed. I think that would be a rare event. But having said that, we have on occasions unloaded with kibbles direct into the shed. In other words, the device that can unload through the hopper can also take it directly to the shed. That has happened on rare occasions. Are kibbles left sitting out there in the open untarped for extended periods? The answer is no.

Mr M.P. WHITELY: My question came about as a result of last night's visit. It is to do with the occupational health and safety of the workers there. After the presentation I was somewhat surprised by the fairly primitive facilities of the shed. It is a single shed with a single chamber. I was expecting it to be a shed within a shed, if you like, containing the product within a shed. I thought that when workers left the shed, there would a wash-down facility within that shed. I was surprised to see that we walked a considerable distance through the personal protective equipment and clothing into some Sulo bins basically, and then had to walk elsewhere to go to a facility to wash our hands. I was fairly disappointed with that. It was not what I saw at the Magellan mine earlier in the day. They have clear delineation of dirty and clean areas and they had clear wash-down facilities near where you took off your protective equipment. It goes back to the original purpose of the shed. You said it was an old BHP shed. Why were not modifications made to bring it up to what I would consider to be occupational health and safety standards? Even the entry door had a hole in it where you could stick your hand through. That would be quite easy to fix by having a door with a push seal. I was quite surprised about that. I would like to hear your comments on that and why further measures were not taken to protect workers.

Mr Stewart: Firstly, I reject that we did not take appropriate measures to protect our workers. I believe we were very diligent. In fact, the focus of the board was very much on what we needed to do to ensure that our employees were adequately protected. Our blood-lead level sampling

indicates that, in large part, that was very successful. We certainly had a couple of people who showed elevated levels. We addressed that appropriately. With regard to your suggestion that there should have been some sort of washing facility inside the shed, that would go counter to the advice -

Mr M.P. WHITELY: No, in a separate chamber in the shed. In other words, you open the door, you shut it, you move into a separate area with a wash-down facility.

Mr Stewart: My view is that they had to walk from where they exited the shed to where they went into the clean-dirty area, or into the dirty area in this case, a matter of probably 20 or 30 metres - or maybe 50 max.

Mr M.P. WHITELY: I would have thought that we walked 150 metres. We went out that same entrance -

Mr Stewart: Prior to us going into construction down there, the shed had another door on the other side. Since we ceased lead shipments, that shed has had another door sealed up.

Mr M.P. WHITELY: We walked about 150 metres, I think, from memory. Other members can correct me if I am wrong. That is what I would have estimated. The wash facilities were separate from the place where you took off your protective clothing. In your PowerPoint presentation you emphasised the need to wash your hands, your face and your forearms. Frankly, the facilities provided to do that were pretty inadequate and not terribly clean. They were separate from the place where you disrobed.

Mr Stewart: I will take your comments on board. I go back to my point that we have introduced a heavy metals clean-dirty area that in large part the guys diligently utilise. Whether it is too far removed from the site of the storage of the heavy metals, that is a point I will take on board.

Mr T.G. STEPHENS: There is a reference to your relationship with the Department of Environment and Conservation. It is stated that the officer from Albany's relationship with the port is a close relationship where she advised you of their visits in advance. Does that lead to preparatory steps being taken? Are you stepping up your safety procedures because of this convenient arrangement where they advise you of their inspection visits?

Mr Stewart: No. The answer is no. I am sure people will take that question as they like, but I can assure you that is not the case.

Mr T.G. STEPHENS: Within the close relationship you have with that officer whereby she have advised you of their visit, did the officer advise you that she had made contact with the Department of Health seeking advice about your dust management strategies?

Mr Stewart: We were aware that as part of this whole air quality monitoring program that was being developed that the department of environment had contacted the Department of Health to jointly, collaboratively, work up an air quality monitoring program.

Mr T.G. STEPHENS: That was a letter sent by the officer on 25 August 2005 to the Department of Health?

Mr Stewart: Correct.

Mr T.G. STEPHENS: Were you shown a copy of that letter?

Mr Stewart: I cannot recall having seen that letter back in - what was it, August?

Mr T.G. STEPHENS: August 2005.

Mr Stewart: I would have to check the records and take it on notice. I do not believe we did see that letter.

Mr T.G. STEPHENS: You are aware that a response to Catherine MacCallum was sent by the Department of Health on 21 September 2005; a detailed response from the Department of Health expressing concern about the need for a full dust risk assessment?

Mr Stewart: I was aware of that letter when we first received a copy in February this year.

Mr T.G. STEPHENS: A letter was written on 21 September 2005 by the Department of Health to the Albany-based officer of the department of environment that you have a close working relationship with, and the first you have advice of that response is 18 months later?

Mr Stewart: Correct. Unfortunately, the officer that we had a close working relationship with, she moved on about the time that that letter was sent out. We received a copy of that letter in February this year.

Mr T.G. STEPHENS: Any explanation as to why you have taken 18 months to get a pretty critical letter?

Mr Stewart: Look, I cannot give an answer. We were not the source of the letter. We had not seen the letter until it arrived in February this year.

The ACTING CHAIRMAN: Did she make any comment before she left that she had written that letter?

Mr Stewart: Not to my knowledge. We were aware that they going to go to the Department of Health as part of the overall air monitoring program that we were collaboratively developing with department of environment. Going back as far as 2002, we working with the department on that. We were aware that this was another step in that process. I have to take on notice whether we saw the initiating letter. I do not think we did. We did not see the follow-up letter from the Department of Health until February this year.

Mr T.G. STEPHENS: The Department of Health has indicated that it has recently been informed by the port of Esperance that a prohibition notice has been served on the port. The Department of Health indicates that it was not consulted on this and it would recommend that nickel, as well as lead carbonate, be included in the prohibition notice. Were you aware that that was the advice of the Department of Health?

Mr Stewart: No.

Mr T.G. STEPHENS: The prohibition notice that you eventually received from the Department of Environment and Conservation was only to recommend or require the cessation of the export of lead?

Mr Stewart: That is correct. We received that cessation notice three days after we had voluntarily ceased operations.

Mr T.G. STEPHENS: Were you involved in any way in discussions with agencies of government that lead to the dropping of this recommendation that nickel as well as lead carbonate be included in that notice to stop the handling of nickel as well as lead?

[12.10 pm]

Mr Stewart: No.

Mr T.G. STEPHENS: With the advantage of hindsight, would you have a preferred method for the export of nickel and lead through your port?

Mr Stewart: No. With the value of hindsight, I would say that, given appropriate moisture levels, whether it be in lead concentrate or nickel concentrate, we believe that it is possible to handle those products over a system in a way that can ensure minimal, if any, dust.

Mr T.G. STEPHENS: Could I interrupt there? In reference to the way in which the Ravensthorpe product is to be handled, last night we saw a large containerisation process being embarked upon.

Is there some explanation for why that containerisation process was not utilised for the export of the more dangerous material lead when it is airborne?

Mr Stewart: I get back to my point that we believe that with the metal concentrates that presented to the port at the appropriate moisture level, our experience in the past has been that they can be loaded onto the vessels with minimal generation of dust. Is that saying that we have been complacent about what we have been doing, because certainly guidelines and standards continually improve? What Ravensthorpe Nickel, BHP Billiton, is doing with its nickel hydroxide has certainly raised the bar as to what the public, the community and the regulators would expect into the future.

The ACTING CHAIRMAN: We are about 25 minutes over the time allocated. There are further questions to put on notice. I just want to wind up with a couple of brief questions and I ask for brief answers probably from you, Jim, relating to the structure of the organisation. The port authority is separately incorporated now and it is not part of the public service. That is correct, is it not?

Mr Matijasevich: Correct.

The ACTING CHAIRMAN: The Port Authorities Act states that authorities are to act in accordance with prudent commercial principles and endeavour to make a profit. Has that requirement affected how the port has conducted itself in the matter?

Mr Matijasevich: Not in my time, but we have looked at the way we handle our commercial dealings in that we have, as you probably saw, employed a full-time commercial officer to deal with our clients. We are here to make a profit, but we also use a lot of that profit to put back into the community.

The ACTING CHAIRMAN: Do the ports compete with each other in terms of gaining product?

Mr Matijasevich: No. We are sort of area-allocated, so competition is not an issue for us.

The ACTING CHAIRMAN: I guess the point is that this would otherwise have been exported from Geraldton. Does the port gain anything by it being exported from Esperance instead, and could that have played a part in some of the procedures that have led to where we are today?

Mr Matijasevich: Not from what I have seen. I think the port here, while you may say it is a separate entity, if it was a totally separate entity, it would be different in its structure. The fact is that we are a facility for the state to generate exports and, as you know, I think that by next year something like $7 billion worth of export goes out of this port. From a state and nation point of view, it has value but when we do make a profit here, it does not go to shareholders; it goes back into consolidated revenue. There is a difference.

The ACTING CHAIRMAN: We will have to wind it up there because we have certainly run out of time. As stated, any questions that we have we will put into *Hansard* and on notice to you and ask that you respond within 14 days. You will see the material that you have offered to provide when you get your copy of *Hansard*, so you will know what it is that you have offered. Can we also have that within 14 days? Thank you for your evidence before the committee today. A transcript of this hearing will be forwarded to you for correction of minor errors. Please make those corrections and return the transcript within 10 days of receipt. If the transcript is not returned within this period, it will be deemed to be correct.

To the members of the public, thank you for your patience. We have gone somewhat over time. We will be reconvening at one o'clock for further submissions. I thank the port authority.

Hearing concluded at 12.15 pm

EDUCATION AND HEALTH STANDING COMMITTEE

QUESTIONS FOR HEARING
TUESDAY, 2 MAY 2007

ESPERANCE PORT AUTHORITY

1. You have highlighted you role and responsibly - how well do you think the Port has discharged these?

2. When the proposal was put to the Esperance Port Authority to ship lead, what effort was made to assess the medical risk of lead dust?

3. What knowledge does the Esperance Port Authority have now of the dangers of lead poisoning?

4. Over what time period was the Esperance Port authority aware of problems from the Port associated with the export of iron and nickel?

5. How many complaints had been received?

6. There is evidence before the Committee not only that local residents of Esperance had raised about nickel dust from the Port for many years, and that these concerns had been confirmed by the Port, for example, in letters ranging from January to August 2004, stating that the nickel level in rainwater tank was higher than the Australian Drinking Water Guideline. Why did you, just one month later on 28 September 2004, seek to amend the Port's licence sot that lead carbonate 'would be exported through our existing nickel handling system'?

7. Was the dust problems associated with the export of nickel and iron a breach of the Esperance Port Authority's licence?

8. Why did the Esperance Port Authority accept lead concentrate for export through the Port when it was aware of the failure of the existing system to contain dust?

9. A submission has been received that lead dust could be seen billowing from ships during loading. Please comment and explain.

10. Is it true that the Port does not have loading chutes which allow for the loading of product onto different sizes of ships to be fully enclosed?

11. Three monthly air monitoring results are required to be collected by the Authority under its licence and reported to DEC annually:

    - Why was the report provided on 31 October 2006 incomplete?
    - If it was due to the commercial provider of analysis of dust gauge monitoring taking 11 months to complete the analysis, why didn't the Authority use another provider?
    - What responsibility did the Authority have to monitor and act on these reports throughout the year?
    - If very high levels were recorded in a timely way, is it satisfactory for the Authority to simply hold these until the annual report to DEC?

12. Would you comment on the proposition that the land based dust monitors used at the Esperance Port are inadequate to monitor the emissions into the environment of Esperance because with strong winds, the fine particulates of lead carbonate can disperse into higher atmospheric layers before descending some kilometres away?

13. Reports have been received that after emptying, kibbles were washed in open areas and on the Port. Is this true? What happened with the washings?

14. How do you explain the high lead and nickel levels on the sea bed (benthic lead)?

15. If the reason for the lead in the harbour is, as the Port claims, due to the flooding of the washdown sump, by the storm that hit Esperance in January, why hadn't his been cleaned in preparation for the bad whether?

16. How do you explain the high lead levels subsequently found in rainwater tanks or on the plants and flowers leading to bird deaths?

17. Did you discuss with the DEC inspecting officers the change form 'moist agglomerates' to pellets?

18. We have been told that the proposal to relocate the Esperance Port was part of the community consultation workshop in Esperance relating to 30 year the BHP Billiton Ravensthorpe Nickel Project. We were also told that the Esperance Port Authority opposed that proposal. Is that correct? What is your view now?

19. We have been told that because workers at the port did not have high lead levels this was used as a justification of why there were no earlier concerns about the potential lead pollution. When Port employees are involved in the movement of the lead carbonate I presume they are protected to the same extent that members were when we visited the lead carbonate facility last night. Is that correct? When were those protective procedures implemented at the Port?

20. Have nickel levels in marine sediment samples taken from the nickel loading wharf since 2002 exceeded national guidelines?

21. Is it true that the Port Authority previously used high volume dust monitors but had stopped because of the cost?

22. What is the definition of an 'operational spill'?

23. Are records kept of spills that do not meet this standard? Can copies please provided if the Authority has not already done so.

24. Please confirm that Port Authorities are each separately incorporated and are not part of the public service?

25. The Port Authorities Act states that Authorities are to act in accordance with prudent commercial principles and endeavour to make a profit. Has this requirement affected how the Port ahs conducted itself in this matter?

26. Could the Authority provide copies of all forms by DEC (Department of Environment and Conservation) officers who have completed OHS (Occupational Health and Safety) induction course to allow entry into the lead carbonate storage shed (Please indicate if these documents are already included in the boxes of materials provided.)

27. In the OHS consultant's report a recommendation was made that the Authority purchase an industrial wet sweeper. Did this happen? When? How often is it used?

28. The approval process through DEC took only 6 weeks from application to the change in the Port's license. Did the Port Authority, or any of your members seek support from, employ or subcontract any political lobbyist?