

Container vessel — oil spill

BAKER v MACLEOD

New South Wales Land and Environment Court, 11 March 1988

The master of a container vessel successfully defended an oil spill prosecution instituted by the Maritime Services Board (MSB) in the Land and Environment Court pursuant to section 6 of the Prevention of Oil Pollution of Navigable Waters Act 1960 (the Act). Following a two week hearing, Mr Justice Bignold in a detailed 71 page judgment found the master not guilty and dismissed the summons. Although the decision basically turned on the evidence, the case is of particular interest in relation to the judge's findings as to the deficiency of the MSB in investigating the cause of the spillage and the deficiencies in its chemical analysis of samples.

The master pleaded not guilty to the offence, on two bases. The first was that the oil did not escape from the vessel. The second was that if, contrary to the master's contention, the oil had escaped from the vessel, then he was entitled to rely on a statutory defence which the Act provides; it is a defence if it could be shown *inter alia* that the oil spill occurred as the consequence of leakage which could not have been avoided, foreseen or anticipated, and that all reasonable steps were taken for prompt discovery of the leakage and after such discovery for stopping or reducing the escape of the oil or mixture (section 7 (1)(b) of the Act). Section 6 of the Act provided that if there was any discharge of oil into any waters within the jurisdiction, which occurs from any ship, then the owner and the master of the ship are guilty of an offence and liable to a penalty not exceeding \$100,000. The judge found that the prosecution had not proved beyond reasonable doubt that the oil had come from the vessel, thus did not have to deal with the question of whether the statutory defence applied.

The prosecution case was entirely based on circumstantial evidence. The prosecution acknowledged that doubt existed as to the actual cause of oil discharging. The prosecution conceded that there was no evidence of direct spillage and apparently no defect in any mechanical device relating to oil facilities. The only explanation proffered was that there was a small split in the vessel's welded hull. The prosecution relied on the circumstantial evidence of the observations of the MSB personnel of the water in the vicinity of the vessel, and the scientific "matching" of the spilt oil with oil carried by the vessel, through the evidence of the MSB's own chemist. Evidence had been given that the oil remained in the vicinity of the vessel for a number of days and that there was oil in the vicinity of the vessel when the vessel was finally allowed to leave Port Botany. An MSB diver gave evidence

that he saw oil balls or bubbles under the hull collected around the seams rather than the plates of the hull.

The master gave affidavit evidence. The chief engineer gave evidence together with a classification society surveyor, a naval architect, an underwater diver and two chemists.

The judge accepted that there was physical proximity and relationship between the oil spill and the vessel. He did not consider that the prosecution had established that the oil seen alongside the vessel subsequently and on the vessel's departure was fresh or different oil. The judge was left in considerable doubt as to how effective the MSB's clean-up operations were. It was conceded by the harbour master and an MSB dangerous goods technician that that oil may have been trapped under the vessel's hull. Furthermore, the judge accepted it was possible the oil could have drained back into the port from the stormwater drains located at the berth and that the oil could have been stirred up by the vessel's engines. Additional scientific evidence tended to suggest that the oil samples taken later were weathered. The judge accepted the expert evidence called on behalf of the defendant, of the naval architect and the classification society's surveyor, which was un rebutted, that even if there had been a crack in the hull it would be impossible for the oil to enter the sea water via such a crack (as the level in the fuel tanks was above the water line). The underwater divers could not discover any crack in the hull, and the hull was clean, like "a white wall" as the vessel had just come out of dry-dock. The expert opinion was that because of the clean condition of the hull and the nature of its construction, finding a crack would have been no problem.

The MSB's scientist, on the question as to whether there was a matching, was very confident that the oil samples matched. One of the two experts called by the defendant said they were probably not a match and indeed, if anything, the slicks came from a rather more volatile fuel than was present in the ship's tank; the other expert said that the problem was a very difficult one and he would not be prepared to say that the samples were identical.

The judge did not find the MSB's chemist's testimony convincing, and considered that the defendant's experts showed a more competent grasp of the subject and proffered a more credible interpretation of the relevant chromatograms. In relation to the gas chromatography tests, the judge considered that one of the defendant's experts was more competent and credible than that of the MSB's chemist. The MSB's chemist had failed to do quantitative comparisons so the judge was not prepared to accept that chemist's principal stance of relying on a visual comparison method.

In relation to the inferences to be drawn from the primary facts, the judge noted that investigation did not commence by the MSB until some 7 or 8 hours after the oil was first observed. The MSB had not excluded the hypothesis advanced by the defendant that the oil originated elsewhere in the dock or had moved on the waters alongside the vessel by the forces of the

wind and tide: indeed the plaintiff's own witness accepted the possibility of oil being collected in a catchment area between the vessel and the dock, assuming its presence at the entrance to the dock and a south westerly wind. No evidence was called by the MSB as to the effect of dispersant and high pressure hoses as well as the use of the vessel's engines to disperse the oil. Two vessels in the dock, which had departed some 12 hours after the spill was first observed, were not investigated and no samples were taken from their fuel tanks. The judge did not think that this failure was significant but thought there was a more serious omission by the MSB in failing to sample fully all the fuel tanks on board the three vessels moored on the opposite side of the dock: only one sample had been taken from each vessel. Bunkering had taken place in the dock during the course of the day. Furthermore, the MSB failed to investigate the various stormwater drains.

Accordingly, the Judge considered that some of the findings individually raised a reasonable doubt against a finding of guilt, and the collective weight of his findings obviously intensified that doubt. Thus the judge concluded that the prosecutor had not established beyond reasonable doubt that the oil discharged into the waters of Port Botany occurred from the vessel.