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# The Marine Observer

*A quarterly journal of Maritime  
Meteorology*



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# THE MARINE OBSERVER

A QUARTERLY JOURNAL OF MARITIME  
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BRANCH OF THE MET. OFFICE

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**VOL. 69**

**No. 346**

**OCTOBER 1999**

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COVER PHOTOGRAPH: The *Cast Elk* at the 'end of the rainbow' on 7 December 1998. This bright primary bow with its outer secondary bow were photographed by Captain W. Yeo on passage from Montreal to Liverpool.

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**The Met. Office OV(M) Scott Building Eastern Road Bracknell Berkshire RG12 2PW.**

**LONDON: THE STATIONERY OFFICE**

## Excellent Awards for 1998

Every ship's meteorological logbook received in the offices of the Observations Voluntary (Marine) branch receives a careful assessment of the quantity and, more importantly, the quality of the observations it contains; this assessment also takes into account the opportunity, availability and willingness of Observing Officers to undertake voluntary weather observing work. The resulting order of merit arrived at then forms the basis for the nomination of those Masters, Observing Officers and Radio Officers (where carried) who have maintained the highest standard of work.

The logbooks covering the period 1 January to 31 December 1998 have been assessed, and we are pleased to name the following ships as those whose observing teams have placed them in the top three positions for the year. They are:

1. m.v. *Eastern Bridge*. (Ropner Ship Management Ltd). Captain I.C. Gravatt. Principal Observing Officers P. Henderson and D.C. Alwis.
2. m.v. *Resolution Bay*. (P&O Nedlloyd Ltd). Captain J.N. Kelleher. Principal Observing Officer J.C. Bennett and Radio Officer M.R.T. Hannan.
3. m.v. *Maersk Surrey*. (The Maersk Company Ltd). Captain K.E. Hammerman. Principal Observing Officer G.S.G. Miller and Chief Officer S. Galloway.

Making important contributions to meteorological information available from UK coastal waters are the ships reporting in the MARID code. Their sea-temperature records and other non-instrumental observations have their own part to play in the forecasting of weather conditions, especially fog, close to home, and we are pleased to acknowledge the efforts of the observers on m.v. *Marine Explorer* (Eidesvik Shipping Ltd), m.v. *Stena Challenger* (Stena Line Ltd) and m.v. *Petro Avon* (Standard Marine Services Ltd) during 1998 which have placed these ships at the top of the MARID fleet. Our thanks and appreciation go to all of the above-named observers, and also to the rest of those nominated in this round of awards whose names appear in the following lists.

Occasionally, queries are received asking why a particular officer has been nominated apparently in preference to his/her immediate colleagues. It should be remembered that these awards refer to particular logbooks compiled several months ago, and that the observing teams associated with them may well be divided among more than one vessel by the time that all the books for a given year have been received, assessed and the nominees revealed. Therefore we would hope that, rather than possibly feeling aggrieved at being 'left out', observers finding themselves in this position will be encouraged to work towards the next round of awards.

By now we hope that everyone will have received their letter of notification and that many will have claimed their awards. However, all observers are advised to check the listings and are asked to contact us if they see their names and have *not* already been notified by post. Any UK Port Met. Officer will be pleased to assist provided that Discharge Book or Seaman's Book numbers can be offered by claimants. Alternatively, claim forms can be faxed to the following number, if preferred: +44 (0)1344 855921, or details e-mailed to: obsmar@meto.gov.uk

HIGHEST RANKING UK VOLUNTARY OBSERVING SHIPS — 1998



Ropner Ship Management Ltd

*Eastern Bridge* (Ropner Ship Management Ltd)



P&O Nedlloyd Ltd

*Resolution Bay* (P&O Nedlloyd Ltd)



The Maersk Co. Ltd

*Maersk Surrey* (The Maersk Co. Ltd)



Eidesvik Shipping Ltd

*Marine Explorer* (Eidesvik Shipping Ltd)

## Excellent Awards (Year ending 31 December 1998)

CAPTAIN	COMPANY
Bailey, D.	P&O Nedlloyd Ltd
Banks, C.E.	P&O European Ferries (Portsmouth) Ltd
Buckley, P.	Blue Star Ship Management Ltd
Chapman, M.A.	Boston-Putford Offshore Safety Ltd
Clarke, A.J.	BUE North Sea Ltd
Connor, I.W.	Associated Bulk Carriers (London) Ltd
Crofts, A.	Ropner Ship Management Ltd
Crowe, P.	James Fisher & Sons (Liverpool) Ltd
Cubbison, G.A.	Boston-Putford Offshore Safety Ltd
Czapelski, E.	Transportacion Maritima Mexicana
Dathan, P.	London Ship Managers Ltd
Dixon, J.G.W.	P&O Nedlloyd Ltd
Dixon-Carter, R.B.	Mobil Shipping Co. Ltd
Dunlop, J.A. *	Standard Marine Services Ltd
Eames, C.D.	Celtic Marine Ltd
Elahi, T.	London Ship Managers Ltd
Ellis, A.W.	P&O Nedlloyd Ltd
Emby, P.	BUE North Sea Ltd
Fee, A.J.	P&O Nedlloyd Ltd
Ferguson, I.G.C.	BUE North Sea Ltd
Finlay, I.	Boston-Putford Offshore Safety Ltd
Fransson, E.	Swan Shipping A/S.
Freeman, D.	Shell Marine Personnel (IOM) Ltd
Godsell, W.E.L.	Acomarit (UK) Ltd
Gravatt, I.C.	Ropner Ship Management Ltd
Gunn, D.A.	Caledonian MacBrayne Ltd
Gurney, R.B.	P&O Nedlloyd Ltd
Hammerman, K.E.	The Maersk Co. Ltd
Harris, J.C.	P&O Nedlloyd Ltd
Hay, R.I.	Great White Fleet Ltd
Heffer, M.J.	BT Shipping (London) Ltd
Hill, I.M.	P&O Nedlloyd Ltd
Hooson, M.A.	BUE North Sea Ltd
Horsburgh, O.S.	Scottish Office, Agriculture & Fisheries Department
Howarth, M.J.	Associated Bulk Carriers (London) Ltd
Hughes, C.J.	P&O Nedlloyd Ltd
Jackson, J.W.	Carisbrooke Shipping plc
Jackson, P.W.	Denholm Ship Management (UK) Ltd
Jeffery, T.L.	F.T Everard & Sons Ltd
Jewell, M.C.J.	Scottish Office, Agriculture & Fisheries Department
Jones, B.N.	Acomarit (UK) Ltd
Kelleher, J.N.	P&O Nedlloyd Ltd
Kendall, R.J.	London Ship Managers Ltd
Kirtley, B.J.	Associated Bulk Carriers (London) Ltd
Lacey, J.H.	Associated Bulk Carriers (London) Ltd
Lawrence, S.J.	British Antarctic Survey
Lax, D.W.	P&O Nedlloyd Ltd
Lewis, D.R.	BP Shipping Ltd
Lyall, R.	Denholm Ship Management (UK) Ltd
MacCorquodale, D.K.	P&O Nedlloyd Ltd
MacPherson, A.R.V.	London Ship Managers Ltd
Mandagie, G.P.	Acomarit (UK) Ltd
Marshall, J.B.	British Antarctic Survey
Meyerhoff, P.D.	P&O European Ferries (Portsmouth) Ltd
Miley, P.A.	Associated Bulk Carriers (London) Ltd
Millar, J.J.	Andrew Weir Shipping Ltd

## Excellent Awards (*contd*)

CAPTAIN	COMPANY
Miller, B.D.	James Fisher & Sons plc
Milloy, J.M.	Associated Bulk Carriers (London) Ltd
Morrison, R.	Caledonian MacBrayne Ltd
Nash, M.D.	Great White Fleet Ltd
Nicholls, G.	Associated Bulk Carriers (London) Ltd
Nicholson, P.	Great White Fleet Ltd
Parsons, R.A.	F.T. Everard & Sons Ltd
Paxton, G.R.	Safmarine Ship Management
Peaston, G.J.H.	P&O Nedlloyd Ltd
Philip, B.P.	Great White Fleet Ltd
Powdrill, F.J.	Boston-Putford Offshore Safety Ltd
Pritchard, B.C.	BP Shipping Ltd
Railson, G.M.	Denholm Ship Management (UK) Ltd
Rangi, A.K.	Blue Star Ship Management Ltd
Richards, P.R.	Blue Star Ship Management Ltd
Roberts, M.C.	BP Shipping Ltd
Robinson, D.J.	Celtic Marine Ltd
Ross, S.M.	Blue Star Ship Management Ltd
Scarisbrick, J.W.	Associated Bulk Carriers (London) Ltd
Scarr, I.R.	Caledonian MacBrayne Ltd
Shoolbraid, C.R.	BP Shipping Ltd
Sharma, Y.	Barber Ship Management AS
Sinnott, J.E.	Associated Bulk Carriers (London) Ltd
Smeeton, J.A.	Associated Bulk Carriers (London) Ltd
Stockley, R.A.	Boston-Putford Offshore Safety Ltd
Talbot, A.P.	P&O Nedlloyd Ltd
Temple, D.W.	Scottish Office, Agriculture & Fisheries Department
Tennant, A.S.	Bergesen d.y. ASA
Tobin, R.	Marr Vessel Management Ltd
Tudor, S.B.	Associated Bulk Carriers (London) Ltd
Tweedie, A.M.	P&O Nedlloyd Ltd
Walker, G.	Great White Fleet Ltd
Walker, M.J.	Associated Bulk Carriers (London) Ltd
Walton, R.	Marr Vessel Management Ltd
Ward, P.J.	Kuwait Oil Tanker Co.
Webster, V.B. *	Eidesvik Shipping Ltd
Wilson, J.L.	Ropner Ship Management Ltd
Winser, D.S.	London Ship Managers Ltd
Worthington, K.	P&O Nedlloyd Ltd
Yadav, R.P.	Barber Ship Management AS
Yelland, B.	Holy House Shipping AB
Yensen, J.R.	Boston-Putford Offshore Safety Ltd
Young, K.N.	James Fisher & Sons plc

\* Denotes a nominee working on MARID vessels in the North Sea and coastal waters. These vessels are recruited primarily to record and transmit sea-water temperatures, and also to provide non-instrumental meteorological observations.

## Excellent Awards (*contd*)

PRINCIPAL OBSERVING OFFICERS AND RADIO OFFICERS (WHERE CARRIED)	COMPANY
Abarintos, F.	Kuwait Oil Tanker Co.
Abarquez, L.	London Ship Managers Ltd
Acot, A.	Safmarine Ship Management
Alday, A.H.	Bergesen d.y. ASA
Almeida, E.	Associated Bulk Carriers (London) Ltd
Almeida, J.	Blue Star Ship Management Ltd
Alwis, D.C.	Ropner Ship Management Ltd
Andoh-Wilson, E.K.	F.T. Everard & Sons Ltd
Angove, S.R.	BP Shipping Ltd
Annand, J.L.	P&O Nedlloyd Ltd Ltd
Appleyard, P.J.	Marr Vessel Management Ltd
Aquilino, J.	Blue Star Ship Management Ltd
Aurora, R.	Associated Bulk Carriers (London) Ltd
Austen, P.A.	James Fisher & Sons plc
Azim, S.	P&O Nedlloyd Ltd
Bailey, T.	P&O Nedlloyd Ltd
Baldismo, R.	Great White Fleet Ltd
Ballesteros, V.	Blue Star Ship Management Ltd
Barnsley, R.M.	P&O Nedlloyd Ltd
Batty, K.	Marr Vessel Management Ltd
Beaton, I.C.	Scottish Office, Agriculture & Fisheries Department
Bennett, J.C.	P&O Nedlloyd Ltd
Bequilla, V.F.	Blue Star Ship Management Ltd
Bingham, M.W.	Denholm Ship Management (UK) Ltd
Blance, A.W.	Scottish Office, Agriculture & Fisheries Department
Blyth, T.J.	BP Shipping Ltd
Booth, M.J.	James Fisher & Sons plc
Bowman, S.	Boston-Putford Offshore Safety Ltd
Branagan, P.	F.T. Everard & Sons Ltd
Brown, B.	BUE North Sea Ltd
Buchan, A.T.	BUE North Sea Ltd
Buley, I.R.	Boston-Putford Offshore Safety Ltd
Cabrillas, A.	Bergesen d.y. ASA
Canceran, D.S.	London Ship Managers Ltd
Canete, R.M.	Blue Star Ship Management Ltd
Cartwright, R.	Boston-Putford Offshore Safety Ltd
Carver, C.S.	P&O Nedlloyd Ltd
Clemente, J.B.	Celtic Marine Ltd
Cloutte, S.R.	P&O Nedlloyd Ltd
Cole, S.J.	Denholm Ship Management (UK) Ltd
Coles, P.C.	Celtic Marine Ltd
Collins, G.	Boston-Putford Offshore Safety Ltd
Cortazar, W.D.	Great White Fleet Ltd
Coyle, J.J.	Scottish Office, Agriculture & Fisheries Department
Crasto, J.D.	Associated Bulk Carriers (London) Ltd
Culkin, G.J.	P&O Nedlloyd Ltd
Cumpstey, M.A.	BP Shipping Ltd
Daha, B.	Kuwait Oil Tanker Co.
Davies, J.M.	BP Shipping Ltd
De Castro, R.M.	Blue Star Ship Management Ltd
Deeney, J.A.	Carisbrooke Shipping plc
Desai, K.A.	Associated Bulk Carriers (London) Ltd
Devereux, L. *	Standard Marine Services Ltd
Dewan, P.D.	Associated Bulk Carriers (London) Ltd

## Excellent Awards (contd)

PRINCIPAL OBSERVING OFFICERS  
AND  
RADIO OFFICERS (WHERE CARRIED)

COMPANY

Dhule, P.D.	Associated Bulk Carriers (London) Ltd
Doshi, R.	Associated Bulk Carriers (London) Ltd
Dowden, K.S.	P&O Nedlloyd Ltd
Eager, C.	Denholm Ship Management (UK) Ltd
Eastwood, P.M.	P&O European Ferries (Portsmouth) Ltd
Ebdy, J.	Scottish Office, Agriculture & Fisheries Department
Erikson, H.	Great White Fleet Ltd
Erispe, E.E.	Celtic Marine Ltd
Evalle, J.	Acomarit (UK) Ltd
Famaloan, R.	Great White Fleet Ltd
Fernandez, S.A.	Associated Bulk Carriers (London) Ltd
Fletcher, W.A.M.	BT Shipping (London) Ltd
Foulkes, K.J.	Mobil Shipping Co. Ltd
Gallaway, S.	The Maersk Co. Ltd
Garner-Richards, P.E.	P&O Nedlloyd Ltd
Geoffrey, O.	F.T. Everard & Sons Ltd
Grennan, D.A.	P&O Nedlloyd Ltd
Grey, G.C.	Marr Vessel Management Ltd
Gyasi, S.J.	Acomarit (UK) Ltd
Hafiz, N.	Barber Ship Management AS
Hannan, M.R.T.	P&O Nedlloyd Ltd
Haque, M.	London Ship Managers Ltd
Harkness, D.J.	P&O Nedlloyd Ltd
Hart, K.T.	P&O Nedlloyd Ltd
Hayes, J.F. *	Eidesvik Shipping Ltd
Hayward, R.M.	P&O European Ferries (Portsmouth) Ltd
Heil, C.C.	P&O Nedlloyd Ltd
Henderson, P.	Ropner Ship Management Ltd
Herath, H.	Ropner Ship Management Ltd
Hill, M.K.	P&O Nedlloyd Ltd
Hiremath, G.C.	Associated Bulk Carriers (London) Ltd
Holt, R.D.	BP Shipping Ltd
Hood, M.P.	NERC Research Vessel Services
Howlett, A.J.	James Fisher & Sons plc
Howse, T.A.	P&O Nedlloyd Ltd
Illingworth, S.J.	P&O Nedlloyd Ltd
Jenkins, L.A.	P&O Nedlloyd Ltd
Jones, N.C. *	Standard Marine Services Ltd
Judson, M.K.	Denholm Ship Management (UK) Ltd
Khanna, R.	BT Shipping (London) Ltd
Klyvcharez, K.	Andrew Weir Shipping Ltd
Kumar, N.	Blue Star Ship Management Ltd
Kumara, W.K.B.	London Ship Managers Ltd
Labine, P.A.H.	Shell Marine Personnel (IOM) Ltd
Lahiri, A.A.	Associated Bulk Carriers (London) Ltd
Langford, M.	P&O Nedlloyd Ltd
Larry, D.	Great White Fleet Ltd
Lasheer, B.S.	Associated Bulk Carriers (London) Ltd
Lau Hill Chu	OOCL (UK) Ltd
Lemon, D.B.	BUE North Sea Ltd
Lloyd, P.G.	James Fisher & Sons (Liverpool) Ltd
Longanilla, F.B.	Blue Star Ship Management Ltd
MacCallum, A.	Scottish Office, Agriculture & Fisheries Department
McCardle, P.G.	Boston-Putford Offshore Safety Ltd

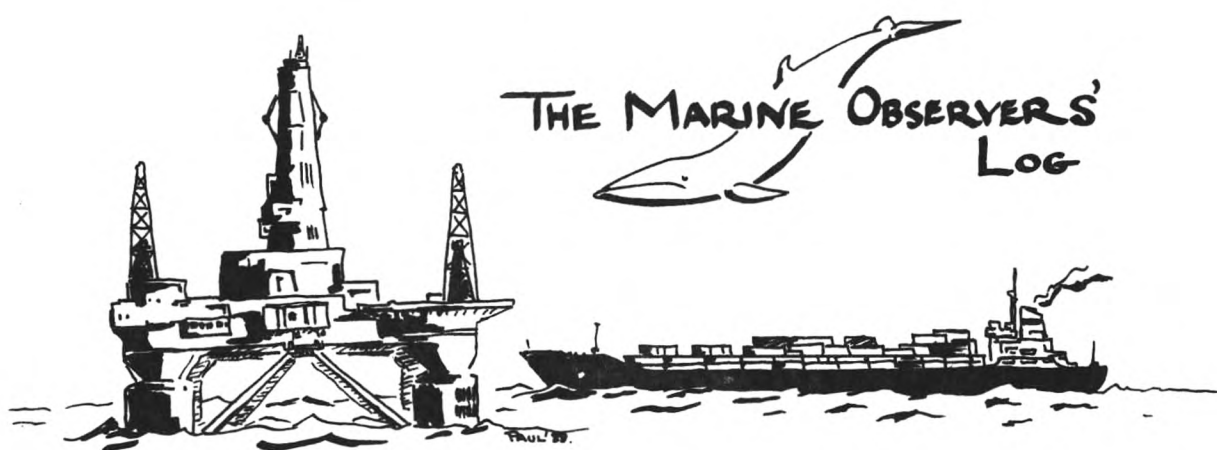
## Excellent Awards (contd)

PRINCIPAL OBSERVING OFFICERS AND RADIO OFFICERS (WHERE CARRIED)	COMPANY
McCormack, W.	Boston-Putford Offshore Safety Ltd
MacDonald, D.	Caledonian MacBrayne Ltd
MacDonald, K.F.	P&O Nedlloyd Ltd
MacKenzie, L.G.	Caledonian MacBrayne Ltd
MacPherson, A.G.J.	Acomarit (UK) Ltd
McRonal, A.	Shell Marine Personnel (IOM) Ltd
Marcos, R.	Great White Fleet Ltd
Marson, I.A.	F.T. Everard & Sons Ltd
Mathews, K.M.	Associated Bulk Carriers (London) Ltd
Mattos, R.T.	Associated Bulk Carriers (London) Ltd
Mayers, N.P.	P&O Nedlloyd Ltd
Mee, S.J.	British Antarctic Survey
Mendis, W.U.C.	London Ship Managers Ltd
Mercado, F.F.	Blue Star Ship Management Ltd
Miller, G.S.G.	The Maersk Co. Ltd
Miranda, M.V.	Associated Bulk Carriers (London) Ltd
Morgan, A.D.	Great White Fleet Ltd
Morton, A.J.	Ropner Ship Management Ltd
Moss, W. *	Stena Line Ltd
Mullins, M.L.	Associated Bulk Carriers (London) Ltd
Munoz, G.V.	Transportacion Maritima Mexicana
Murray, D.	F.T. Everard & Sons Ltd
Noronha, T.W.	Associated Bulk Carriers (London) Ltd
Ocampo, M.B.	Acomarit (UK) Ltd
Oliver, G.R.	F.T. Everard & Sons Ltd
Onasis, A.	Barber Ship Management AS
Orcino, E.	Celtic Marine Ltd
Osei-Amoako, I.	Acomarit (UK) Ltd
Parnaby, J.E.	P&O Nedlloyd Ltd
Pasik, A.	Marr Vessel Management Ltd
Patel, F.R.	Associated Bulk Carriers (London) Ltd
Patnakar, B.G.	Associated Bulk Carriers (London) Ltd
Pearson, J.	Reading & Bates (UK) Ltd
Peneranda, P.	Swan Shipping A/S
Peroy, D.E.	P&O European Ferries (Portsmouth) Ltd
Pila, A.	London Ship Managers Ltd
Pinera, F.	Great White Fleet Ltd
Prieto, J.R.	Transportacion Maritima Mexicana
Priyantha, M.V.G.T.	London Ship Managers Ltd
Quayson, B.K.	P&O Nedlloyd Ltd
Rainey, M.	BUE North Sea Ltd
Rajesh, T.	Associated Bulk Carriers (London) Ltd
Rebeiro, N. *	Stena Line Ltd
Reeder, A.	Boston-Putford Offshore Safety Ltd
Reese, H.	Boston-Putford Offshore Safety Ltd
Reynaldo, H.	Kuwait Oil Tanker Co.
Richardson, J.A.	P&O Nedlloyd Ltd
Roberts, I. '	Stena Line Ltd
Robins, C.P.J	P&O European Ferries (Portsmouth) Ltd
Rock, P.A.	Denholm Ship Management (UK) Ltd
Roco, F.	Swan Shipping A/S
Rodrigo, G.B.	Barber Ship Management AS
Rodrigues, A.	Associated Bulk Carriers (London) Ltd
Ruttledge, T.J.	BP Shipping Ltd

## Excellent Awards (*contd*)

PRINCIPAL OBSERVING OFFICERS AND RADIO OFFICERS (WHERE CARRIED)	COMPANY
Ryan, C.	Mobil Shipping Co. Ltd
Salgado, J.	Holy House Shipping AB
Samaramash, J.	London Ship Managers Ltd
Sarma, R.N.	Associated Bulk Carriers (London) Ltd
Sayomac, R.	Holy House Shipping AB
Seaney, P.	P&O Nedlloyd Ltd
Selvido, D.A.	London Ship Managers Ltd
Shahadah, M.	Associated Bulk Carriers (London) Ltd
Shaikh, F.R.	Associated Bulk Carriers (London) Ltd
Sim, R.	Bergesen d.y. ASA
Sime, D.S.	Andrew Weir Shipping Ltd
Singh, S.	Associated Bulk Carriers (London) Ltd
Sivakumaran, C.	Ropner Ship Management Ltd
Smith, D.A.	Scottish Office, Agriculture & Fisheries Department
Smith, R.	P&O Nedlloyd Ltd
Sridhar, K.	Associated Bulk Carriers (London) Ltd
Stevenson, I.C.	Scottish Office, Agriculture & Fisheries Department
Stone, J.A.	BP Shipping Ltd
Svalle, J.R.T.	Acomarit (UK) Ltd
Tabisaura, J.	Great White Fleet Ltd
Tasker, B.R.G.	Denholm Ship Management (UK) Ltd
Thompson, J.	BUE North Sea Ltd
Tranter, I.D.	Denholm Ship Management (UK) Ltd
Tucker, B.D.	P&O Nedlloyd Ltd
Tulley, J.	Marr Vessel Management Ltd
Vaswani, S.G.	Associated Bulk Carriers (London) Ltd
Veitch, C.	Boston-Putford Offshore Safety Ltd
Villas, A.C.	Acomarit (UK) Ltd
Vine, J.P.	James Fisher & Sons (Liverpool) Ltd
Virgilio, J.	Celtic Marine Ltd
Voss, N.A.	P&O Nedlloyd Ltd
Wade, G.E.	P&O Nedlloyd Ltd
Wallis, A.P.	British Antarctic Survey
Webster, J.M.	P&O European Ferries (Portsmouth) Ltd
Williams, P.	Safmarine Ship Management
Wisher, M. *	Eidesvik Shipping Ltd
Wisher, M.N.	P&O Nedlloyd Ltd
Worthington, B.	James Fisher & Sons plc
Wright, H.S.	Great White Fleet Ltd

\* Denotes a nominee working on MARID vessels in the North Sea and coastal waters. These vessels are recruited primarily to record and transmit sea-water temperatures, and also to provide non-instrumental meteorological observations.



## October, November, December

*The Marine Observers' Log* is a quarterly selection of observations of interest and value compiled from the meteorological logbooks of the UK Voluntary Observing Fleet and from individual observers' contributions. Responsibility for the content of each report rests with the contributor, but texts are subject to amendment at the discretion of the Editor. All temperatures are Celsius unless otherwise stated. The standard international unit for barometric pressure is the hectopascal (hPa) which is numerically equivalent to the millibar (mb).

### TROPICAL STORM 'ELVIS'

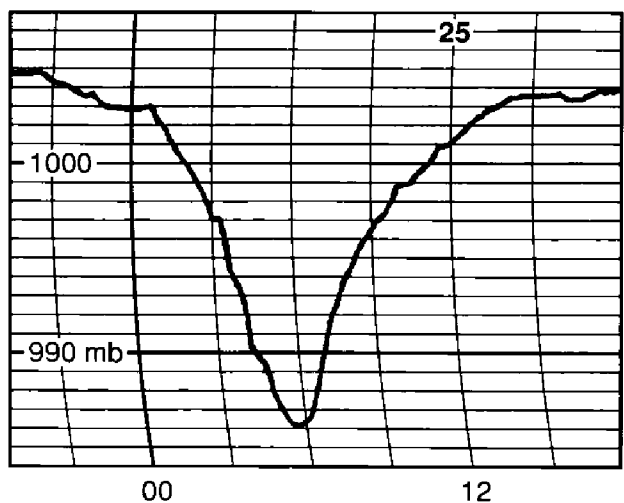
#### South China Sea

m.v. *Shenzhen Bay*. Captain M. Watts. Singapore to Hong Kong. Observers: the Master, A.H. Abid, 1st Officer, L.P.V. des Landes, 2nd Officer, P.E. Garner-Richards, 3rd Officer, D.G. Bell, 4th Officer and ship's company.

23–26 November 1998. When the vessel left Singapore regular weather facsimile maps and EGC reports were received which showed a depression developing in the South China Sea.

A close watch was kept on the movement of this depression as it was predicted to move in a west-north-westerly direction and intensify. This would take the depression right across the ship's course line. On the 24th the depression had been upgraded to a tropical storm, and the vessel began to feel the effects at 2000 UTC when the wind started to increase to force 5 while the pressure began to fall. By 2200 the wind had veered to NW'ly and increased to force 8; the vessel began to pitch heavily and take spray forward. The cloud cover also increased and there were frequent heavy rain showers.

The course of the storm continued to be monitored and it was predicted to pass about 70 n mile ahead of the vessel at about 0600 on the 25th. The weather continued to deteriorate with the wind backing to W'ly and increasing to force 9 while gusts of 50 knots were noted. At 0600 the wind was SW'ly, force 8 and the pressure had fallen to its lowest point of 984.2 mb, see barograph chart. The wind then backed to SE'ly while decreasing and the pressure started to rise but the heavy showers continued.



The following observations have been extracted from those taken during the period.

Date and time	Pressure	Wind Dir'n	Force	Remarks
24th/1600	1008.5	N	3	Partly cloudy with occasional light rain. Swell and sea increasing.
2000	1005.7	N	5	Overcast with frequent moderate rain showers. Moderate swell. Moderate seas.
2200	1003.0	NW	8	Occasional moderate/heavy rain showers. Moderate/heavy swell. Rough seas.
25th/0000	1004.2	WNW	8	Occasional heavy rain showers. Very rough seas.
0200	1003.0	WNW	8/9	Heavy swell. Frequent heavy rain.
0300	1000.6	W×N	8/9	
0400	997.0	W×N	9	
0500	989.0	W	8	
0600	984.2	SW	8	Vessel closest to storm centre, about 70 n mile.
0700	990.6	SE	8/9	
0800	995.8	SE	8	
0900	998.4	SE	7	
1200	1002.3	SE×E	6	Frequent heavy rain showers.
1400	1005.7	E×S	6	
1600	1005.8	NE×E	7	Continuous heavy rain.
2000	1006.2	W	6	

Continuing on its west-north-westerly path, the storm reached the coast of Vietnam where it began to dissipate. The wind remained at force 6, occasionally reaching force 7, until the vessel arrived in Hong Kong at 0900 on the 26th having continued to experience moderate rain showers and periods of moderate to heavy rain along with rough seas and heavy swell.

During this period, a storm victim in the form of the eagle-like bird shown in the photograph on page 173 took shelter onboard, and was quickly named 'Elvis' [*Ed.* We think it is probably an osprey.]. Initially sighted soaring above the vessel on the 24th, the bird was found lying frightened and helpless on deck on the 26th. It was slightly oiled and had ruffled feathers, seeming to be a little bewildered through exhaustion. After being given food, bed and rest the bird appeared to have made a full recovery and was released on the 27th, then flying towards the nearest coast.

Position of ship at 0600 UTC on the 25th: 12° 56' N, 111° 26' E.

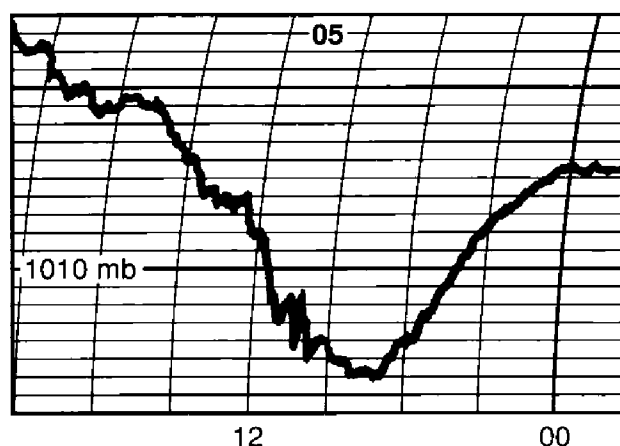
## DEPRESSION

### North Pacific Ocean

m.v. *Pacific Sandpiper*. Captain P.A. Booker. Tokai Mura to Balboa. Observers: the Master and ship's company.

4–6 December 1998. On leaving Japan on the 4th reports were received that there was a developing low-pressure area with a central pressure of approximately 1014 mb in position 32° N, 136° E, moving east-north-east at 30 knots across the vessel's projected course. The low was monitored and, by 1200 on the 5th, the vessel's position was 36.5° N, 148° E with the wind direction and speed at SE'ly, force 7. The low was next reported in position 35° N, 145° E, central pressure 1006 mb but its speed had increased to 45 knots on the same heading as before.

By 1300 on the 5th the wind had increased to E'ly, force 9 and, by 1500, was slowly decreasing to E'ly, force 6 or 7; the pressure at the ship was 1008.2 mb. The barograph trace shows the pressure fluctuations during the 5th (corrected for height of 16 m, and temperature of 15°).



The low by 1800 was in position 37° N, 150° E moving east-north-east at 45 knots with a central pressure of 1006 mb, and the wind had come round to NNW'ly, force 7. By 2200 the pressure was beginning to rise, reading 1014.1 mb while the wind had decreased slightly to NW'ly, force 6. The wind was N×W'ly, force 5 at 1800 on the 6th and the pressure had risen to 1028.6 mb but the passing low had created a northerly swell of 6 m.

The wind remained above force 5 for the next four days due to various pressure systems and fronts in the area while the swell did not fall below 5 m in that time.

Position of ship at 1800 UTC on the 5th: 36° 30' N, 149° 12' E.

## SQUALL

### Eastern North Atlantic

m.v. *City of Cape Town*. Captain G.J.H. Peaston. Las Palmas to Port Elizabeth. Observers: J.G. Swindlehurst, 1st Officer, K.C.S. Gregory, Cadet and G. Harrison, SM1.

29 October 1998. At 0400 UTC upon taking up the 4–8 watch, the first sign of cloud cover in an otherwise clear sky was sighted to the east-south-east of the vessel, and was accompanied by lightning although no thunder was heard. At the time the vessel was following a course of 142° at 22 knots.

Over the next hour the cloud cover slowly increased until 8 oktas of cumulonimbus had formed, and frequent lightning continued although there was still no thunder audible. At 0505 the wind was heard and seen to increase quickly to force 7, appearing to be forward of the beam, and five minutes later the vessel entered a heavy rain squall; this continued until 0515 when the wind and rain started to ease.

At 0530 as breaks in the cloud were noted, there was a flash of lightning close astern on the starboard quarter, this time accompanied by a loud crack of thunder, but by 0545 the lightning was fading astern as the wind decreased to force 2 or 3. The pressure was 1012.2 mb, steady throughout.

Position of ship: 05° 58' N, 14° 50' W.

## **WATERSPOUT**

### **Flores Sea**

m.v. *P&O Nedlloyd Napier*. Captain J. Kennedy. New Zealand to Singapore. Observers: the Master and T. Davidson, 3rd Officer.

9 October 1998. Between 2257 UTC and 2316 the development and activity of a waterspout was noted whilst the vessel was off the north coast of Flores, following a course of 270°. It was first noticed forming at one point off the starboard bow at a range of 6–7 n mile; associated with it were layers of ragged stratus and heavy rain showers.

At its full development the waterspout seemed light-grey in colour against a dark background, and was perfectly cylindrical with an expanding top at cloud-base level (which was estimated to be at 500–600 feet). The spout seemed to travel into the path of the vessel but its lower half appeared to vanish as the vessel approached, although on the surface there was a perfect circle of undisturbed water with a ring of water revolving around it in a clockwise motion. This feature was viewed at approximately 20 m from the starboard wing at 2316 and was the last feature to be seen of the waterspout before the vessel entered a heavy rain shower.

At the time of the observation the air temperature was 27.0°, wet bulb 25.4°, pressure 1018.8 mb rising gradually, and the wind was light and variable. The sea was rippled with a negligible swell.

Position of ship at 2316 UTC: 07° 57.9' S, 119° 58.6' E.

*Note.* The *P&O Nedlloyd Napier* is a Selected Ship observing for the New Zealand Voluntary Observing Fleet.

### **North Sea**

m.v. *Shetland Service*. Captain I. Ferguson. Kittiwake Oilfield. Observers: the Master, J. Thompson, Chief Officer, M. Russell, 2nd Officer and ship's company.

5 December 1998. At 1045 UTC during the process of assisting the shuttle tanker *Petro Fife* moor to the Kittiwake loading buoy, the *Fife*'s Master, Captain Bob Noakes, indicated the presence of a waterspout approximately 2 n mile to the north-west. The funnel could be clearly seen from the sea surface lifting spray to an estimated 30 m but its definition below the cloud base was unclear.

It was during this observation that a violent snow squall passed through and the wind veered from N×W'ly, force 7 to NNE'ly, force 10. The platform supply vessel *Skandi Falcon*, working alongside the Kittiwake at the time, pulled clear

when he reported gusts of wind reaching 60–65 knots. Visibility during the squall was reduced from 25 n mile to just over 0.5 n mile for approximately 15 minutes.

After the passage of the squall, the spout dissipated and the wind fell temporarily to force 5 or less. A second spout was seen further to the north-west some 10 minutes later, lasting for five minutes before collapsing.

At the time of the observation the air temperature was 4.4°, wet bulb 2.6°, sea 8.7°, pressure 1011.0 mb, and the cloud cover was 7 oktas of cumulonimbus at 800 feet.

Position of ship: 57° 28' N, 00° 31' E.

### North Atlantic Ocean

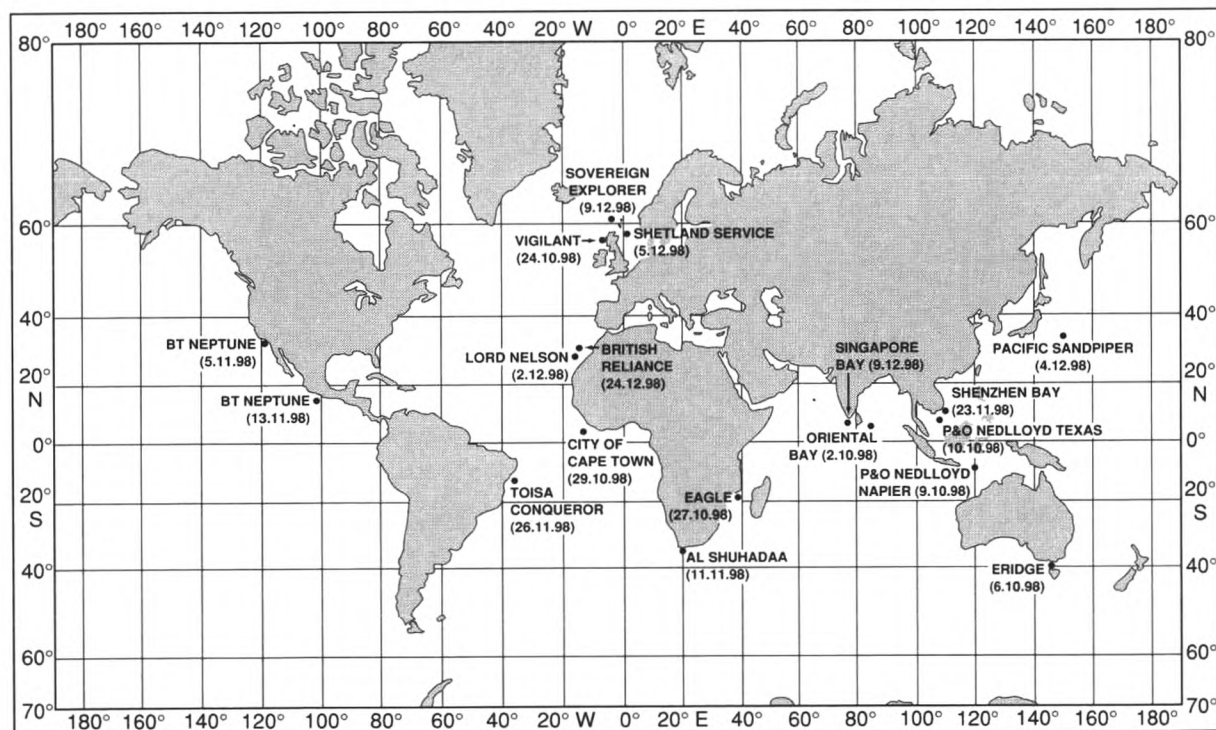
m.v. *British Reliance*. Captain J.M. Cleugh. Fujairah to Rotterdam. Observer: P. Anderson, 3rd Officer.

24 December 1998. At 1610 UTC heavy rain was observed reaching the sea surface in the distance; at the same time a large band of rain clouds was noted very clearly on the 3-cm radar, moving slowly towards the vessel. On closer observation a waterspout could clearly be seen on the leading edge of cumulonimbus clouds, extending from the lower surface towards the sea; its height was approximately 1,300 feet, its diameter was about 5 m, and it was believed to be rotating anti-clockwise. As the cloud neared the vessel, a second waterspout could be seen but it did not reach the surface; the diameter of this spout was 2–3 m.

Both spouts passed down the starboard side of the vessel at about 4 n mile and were followed by heavy rain which then obscured them.

Weather conditions were: air temperature 17.7°, wet bulb 14.9°, sea 19.0°, pressure 1022.5 mb, wind NE'ly, force 4.

Position of ship: 32° 41' N, 14° 30' W.



Position of ships whose reports appear in *The Marine Observers' Log*.

## CETACEA

### Western South Atlantic

m.v. *Toisa Conqueror*. Captain B. Walls. On station offshore Brazil. Observers: the Master and D. Gott, Chief Engineer.

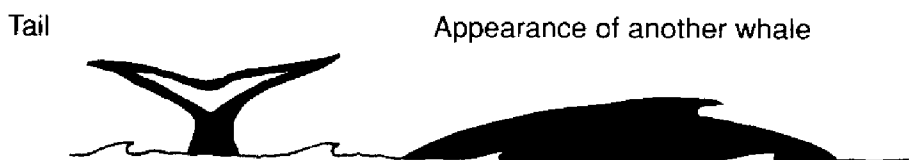
26 November 1998. At 1400 UTC whilst steaming through the oil field, the tail fin of a whale was seen protruding vertically about 2 m from the sea, not moving. Altering course to have a closer view, it was assumed that the whale was dead and was floating in this position as a dead whale had been seen in this area a year earlier. However, the vessel's approach disturbed the whale when about 250 m away and the tail, white underneath, dark-blue or black on top, and 3 m across disappeared. A few seconds later the whale surfaced to blow before slowly moving off, and there was a quick sighting of a baby whale alongside it. It was six to eight minutes from first sighting the raised tail to disturbing the whale during which time the tail did not move. The water depth was 19 m.

Position of ship: 11° 05' S, 36° 38' W.

### Indian Ocean

m.v. *Al Shuhadaa*. Captain P.J. Ward. Mina al Ahmadi. Observer: the Master.

11 November 1998. During the morning watch, two or possibly three whales were observed ahead of the vessel at 0715 UTC blowing and breaking above the water. The dorsal fin and most of the back of one whale was visible. Later at 0850 there was more incredible whale activity to the north-east about 2 n mile from the vessel where a whale repeatedly jumped clear of the water, while to the south-west about 1 n mile away, other whales cavorted. One of these raised its tail clear of the water for several minutes at a time; the tail was white on the underside.



The sketch shows the raised tail and an idea of the appearance of another of the whales.

Position of ship: 35° 15' S, 20° 02' E.

### North Atlantic Ocean

Rig *Sovereign Explorer*. Observers: R. Watson, D. Acton and C. Tait.

9 December 1998. From 0948 UTC until 0957 a number of pilot whales were observed at the installation. The pod comprised a minimum of 20 individuals, there were probably 30–40 in all, headed north or north-east from the south-west. They were seen holding in front of the rig, milling around and possibly playing but seeming to be lethargic as if perhaps confused by the rig being in their way; they certainly did not show the boisterous habit of leaping dolphins.

The largest whales were approximately 4.5–5.5 m long, but the group included at least three juveniles about 1 m long holding very close alongside a larger animal, probably the female. The females(?) were smaller by about 1 m than the largest whales. Possibly, some of the individuals had dorsal fins which appeared to be much more narrow and pointed than the expected (and much more numerous)

rounded dorsal fins observed. After milling around in front of the rig, the pod continued north-east. The wind was SW'ly, force 7 and the seas were 5–6 m high.

Twelve months earlier Ross Watson had seen approximately 40 pilot whales displaying the same behaviour and moving in the same direction but in the Osprey Oil Field.

Position of rig: 60° 30' N, 04° 21' W.

## **BIRD**

### **South China Sea**

m.v. *P&O Nedlloyd Texas*. Captain K. Worthington. Singapore to Yantian. Observers: the Master and D. Hinson, 1st Officer.

10 October 1998. A small dead bird was found on deck at 0000 UTC. It was about 11 cm from its tail to the top of its head, and was brightly coloured all over, particularly its orange-red sharp, prominent bill about 20 mm long, and the top of its head which was also red. The tops of the wings were dark-blue/black with white spots, and there was also a dark-blue patch on the sides of the head behind the eyes. Its breast was white edged with light-orange.

Opinion on board was that the unlucky passenger was a species of kingfisher which had possibly come aboard in the Singapore area or from the coast of Vietnam about 100 n mile away.

Position of ship: 10° 20' N, 109° 34' E.

## **BIOLUMINESCENCE**

### **Indian Ocean**

m.v. *Singapore Bay*. Captain J.G.W. Dixon. Suez to Singapore. Observers: S. Gallacher, 3rd Officer and C. Booth, SM1.

At 1700 UTC bioluminescence was observed in the form of large green patches about 10 m in diameter. These patches were first noted as 'clouds' about 2 m in diameter which rose to the surface before expanding with dynamic effect. As many as five such patches could be seen at one time, the furthest one being about 200 m from the vessel.

They gradually died down after roughly 15 minutes although for the next two hours bioluminescence in the form of small spots of light could be seen very close to the ship's sides and disappearing in the wake. At the time of the sighting, the ship's course was 107° at 21.3 knots.

Weather conditions were: air temperature 27.2°, wet bulb 25.1°, sea 28.2°, pressure 1010.3 mb, wind SE'ly, force 3.

Position of ship: 06° 40' N, 77° 22' E.

## **RAINBOW**

### **Bass Strait**

m.v. *Eridge*. Captain E.M. Holmyard. Newcastle, NSW to Bristol. Observers: A. Rodrigues, 3rd Officer and N. Dizon, GPI.

6 October 1998. At 1045 UTC when the vessel was north of the Hogan Group a rainbow was noticed as wind and rain started to approach from ahead, the new moon being right astern at an elevation of about 27°. The arc covered a full 180°

and seemed to be white in colour, but continuous observation revealed that 'rainbow' colours were present although very dim. The rainbow lasted for about two minutes.

The wind at the time was WSW'ly, force 8 and the skies were generally cloudy with precipitation near to but not at the ship.

Position of ship:  $39^{\circ} 00' \text{ S}$ ,  $146^{\circ} 55' \text{ E}$ .

### North Atlantic Ocean

s.t.s. *Lord Nelson*. Captain J. Fisher. Gibraltar to Gomera. Observers: C.L. Cupples, 2nd Officer, V. Manze, watch leader and members of the aft starboard watch.

2 December 1998. Whilst on a course of  $180^{\circ}$  at 5.5 knots an indistinct white lunar rainbow was spotted in the eastern sky at 0320 UTC. A brief but heavy shower had occurred and, as the precipitation stopped, the near full moon appeared from behind the small cumulus clouds. The rainbow faded and was then replaced by a more full and distinct one; the ends of this bow were bearing  $060^{\circ}$  and  $120^{\circ}$ , the former showing more colour. Most of the arc was visible, only the top quarter remained indistinct. Two more faint rainbows were spotted during the next watch.

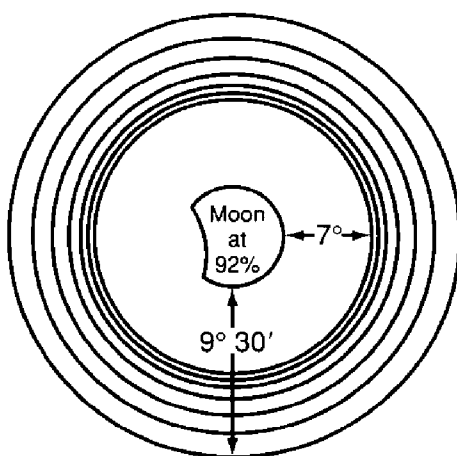
Position of ship:  $30^{\circ} 10' \text{ N}$ ,  $15^{\circ} 28' \text{ W}$ .

### HALO

#### Indian Ocean

m.v. *Oriental Bay*. Captain B. Graham. Suez to Singapore. Observers: A. Liddell, 2nd Officer, A. Eyton, Cadet and M. Harrison, SM1.

2 October 1998. At 1610 UTC some 40 minutes before the meridian passage of the moon, a complete halo was seen around the moon. As indicated in the sketch, the halo appeared as a white ring about  $2.5^{\circ}$  wide, no other colours being noted although the halo was of maximum intensity around the inner edge decreasing towards its outer edge. On taking sextant angles, the halo's inner edge was  $7^{\circ}$  from the moon, and the outer edge was  $9^{\circ} 30'$  away.



The halo was observed for about 40 minutes and faded away shortly after the meridian passage of the moon. The moon was at the 92 per cent phase at the time, and the cloud cover was 1 okta of small cumulus with 8 oktas of cirrostratus.

Position of ship:  $05^{\circ} 45' \text{ N}$ ,  $82^{\circ} 29' \text{ E}$ .

## METEORS

### Gulf of Santa Catalina

m.v. *BT Neptune*. Captain M. Heffer. Panama to Long Beach. Observers: W. Fletcher, 3rd Officer and W. Salvadora, AB.

5 November 1998. At 0641 UTC a bright meteor-like object was observed falling for approximately one second, bearing north of the vessel. About 1.5–2 seconds after it had disappeared, another similar object was observed bearing approximately 300°, also lasting for about one second.

Both objects appeared at an altitude of 45°–50° in the clear sky, fell straight down and disappeared at an altitude of 10°–15°; they were also bright, brighter than typical meteors usually observed, and were white in colour although they disappeared with a more intense bluish flash.

On the 13th at 0440 when the vessel was off Acapulco heading for Panama, a meteor was observed for about 0.5 second bearing about 150°. The object was an intense greenish-white colour and left a trail of blue ‘sparks’ behind it. Both this object and its trail were similar to a fireworks rocket but fell rather than climbed; it was initially sighted at an altitude of about 50°, and fell at an angle of 45° towards the south. At the time of the sighting the cloud cover was 2 oktas, the visibility was good although there was haze at the surface.

Position of ship on the 5th: 33° 04' N, 117° 55.30' W.

Position of ship on the 13th: 16° 39' N, 101° 43' W.

### Indian Ocean

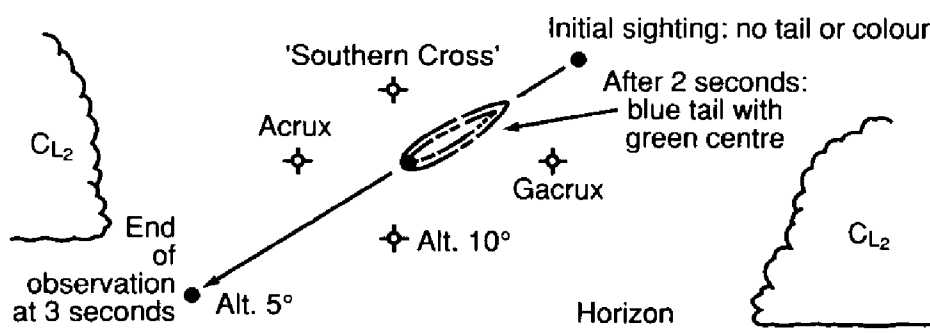
m.v. *Eagle*. Captain P.J. Chambers. Ras Tanura to Louisiana Offshore Oil Port. Observers: K.C. Taylor, 2nd Officer, M.P. Littlewood, 3rd Officer and G. Salazar, GP2.

27 October 1998. Whilst handing over the watch at about 0120 UTC the attention of the observers was drawn to the Southern Cross where a ‘shooting star’ showing no particular characteristics was sighted.

However, within two seconds it developed a tail that consisted of bright-blue and green colours, bright enough to light up the area 15° on either side of the object. The shooting star appeared about 30° above the horizon and shot right through the centre of the Southern Cross. It was the brightest shooting star that the observers had seen, and could best be described as resembling a missile judging by the amount of light being emitted. The sketch indicates what was seen.

The entire observation lasted for three seconds after which the shooting star finally disappeared when about 5° above the horizon, and it became the topic of conversation for the following few days. The ship’s course was 210° at 14 knots.

Position of ship: 18° 32.5' S, 39° 44.4' E.



## AURORA BOREALIS

### North Minch

f.p.v. *Vigilant*. Captain D.L. Beveridge. Fishery protection duties. Observers: C. Holmes, 1st Officer (Safety) and P. Paterson, Seaman.

23/24 October 1998. The ship was patrolling northwards at 0120 UTC in clearing skies when a white glow or loom was revealed above the low cloud cover above the Isle of Lewis. The glow was evident 2 points on the port bow at an elevation of about 20° to 25° above the horizon, and its elevation gradually increased to 35° as it spread to both port and starboard. The intensity faded slightly but pulsing and rippling white light could be seen, whilst also apparent above the rest of the display was a long ray or 'fringe' of light at an approximate elevation of 40°.

On 11/12 November another display was noted briefly at 2200 UTC but it was then obscured by cloud.

Position of ship: 58° 06.8' N, 06° 19.2' W.

*Note.* Ron Livesey, Director of the Aurora Section of the British Astronomical Association, said that this event was associated with a particle stream from the sun which sprayed the Earth, leading to some magnetic disturbance.

## MISCELLANY ...

### An additional mélange of maritime sightings

*Arctic Goose.* 5 November 1998. After sunset Third Officer A. Sukhanov watched a school of about a dozen dolphins on the starboard side of the vessel. They were 1.0–1.5 m long, but as it was already dark, closer observation was not possible. The vessels' position was 18° 21' S, 75° 11' W.

*British Reliance.* 2 December 1998. At 1500 UTC P. Anderson, Third Officer and P. Haswell, Cadet spotted a group of approximately 20–30 dolphins, possibly Bottlenose; they passed down the port side of the vessel at a distance of about 10 m, continuously surfacing and diving, and occasionally jumping clear of the water. The ship was in position 01° 38.5' S, 47° 53' E.

*Lincoln Spirit.* 27 November 1998. At 1700 UTC a pod of about eight whales was watched by Captain P.G. Rafferty, Third Officer M.H.N. Rifkhan and Second Officer K.W.K. Gunasekara whilst the vessel was steering along the coast of Mexico. The whales were about a mile away but remained unidentified. The ship's position was 23° 31.4' N, 112° 01.0' W.

*P&O Nedlloyd Texas.* 5 November 1998. The vessel passed through a front in position 47° 51' N, 179° 18' W. The wind increased to SW'ly, force 11/12 with very heavy rain which turned to sleet and then hail while the visibility reduced to about 10 m. After about two minutes moderate rain returned and the front cleared the vessel. The dry-bulb temperature was 8.0° and the pressure was 1011.2 mb.

*St Helena.* 28 November 1998. Upon departure from St Helena Second Officer N. Mogg and N. Abbott, ETO noted orographic cumulus cloud over the island while cumuliform cloud at sea was noted to spread out along an apparent inversion layer.

*Shenzhen Bay.* 20 October 1998. At 0930 UTC just before the vessel was due to enter the Gulf of Aden, small eddies started appearing on the horizon and were watched by Second Officer H. Radha. By 0955 the sea temperature had risen by 4.5° to 30.5° and large eddies had started to form. The vessel also started yawing off course to port and starboard by about 3°. At 1025 the vessel veered off course by 12° to port in a large tide rip, then about two minutes later by 15° to starboard. By 1033 the rips and eddies had disappeared. The ship was 12 n mile north of Guardafui.

*Tasman Spirit.* 23 November 1998. Whilst on passage from Port Hueneme to Puerto Bolivar in position 08° 14' N, 93° 14' W a bird resembling a juvenile Peregrine falcon was observed on the ship's crane by Captain M.C. Rutter and Second Officer G. Kasturiarachchi.

*Victoria.* 3 December 1998. At sunset Captain C. Sample, Second Officer S. Rowe, Third Officer J. Brown and Coxn A. Lynch awaited the green flash phenomenon but were rewarded with a quite distinctive blue flash, previously seen only by the Master among those present.

... and finally

Wherever possible we endeavour to print observers' sightings together with full expert comment and analysis. Should our production schedule preclude this, then we will publish comments retrospectively, referring readers to the appropriate edition of *The Marine Observer*.

ISSUE	PAGE	SHIP	COMMENTS
April 1999	62	<i>Peninsular Bay</i>	Captain M.K. Barritt, Chairman of the Royal Naval Birdwatching Society, said: "This is a very good description of a Moorhen ( <i>Gallinula chloropus</i> ). It is found along the Nile River. However, this might possibly have been a bird on the spring migration back to the region of Russia."

## SCENE AT SEA



Left: 'Elvis' (the one with the feathers) on board the *Shenzhen Bay* on 26 November 1998. (See page 163.)

Below: Two views of a swarm of bees on the *Zetland* at La Cienaga, Colombia on 6 October 1998. The swarm was 2.8 n mile from the nearest land, and stayed for about 24 hours before disappearing.

Unknown



A. Garde



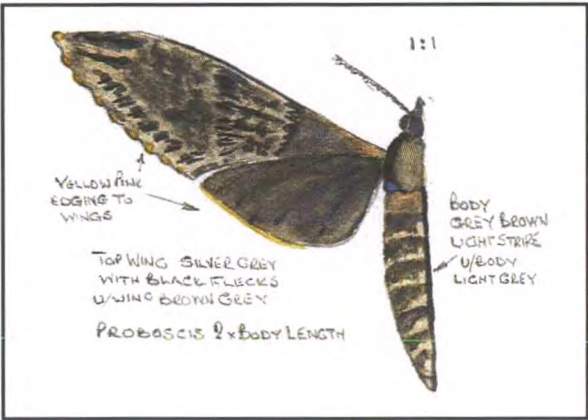
A. Garde

*Note.* Andy Whittington, Curator of Entomology for the National Museums of Scotland, said: "The bees almost certainly belong to the family Apidae and may even be from the genus *Apis*. The common honeybee (*Apis mellifera*) belongs to this genus and behaves in much the same manner during swarming. Specific identification is not possible from the photograph.

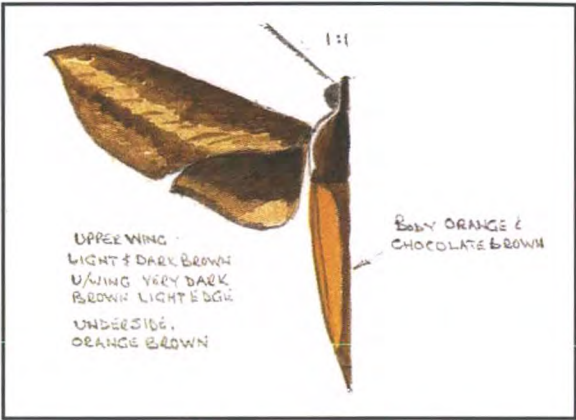
"Swarming occurs in many species of bee, and is a mechanism to prevent overcrowding in the hive. The itinerant young queen and an attending swarm of workers will have been trying to locate a suitable nest site and may well have been disrupted from barges during loading [Ed. The vessel was moored to buoys, and loading coal.], but will have departed again in search of a better location to nest."

The observers were Captain P.A. Miley, Cadet A. Garde and Chief Engineer P.D. McMahon.

**Hawkmoths – a selection of paintings of moths observed by J.O.H. Snell  
(passenger on board the *Arunbank*, 1998).**

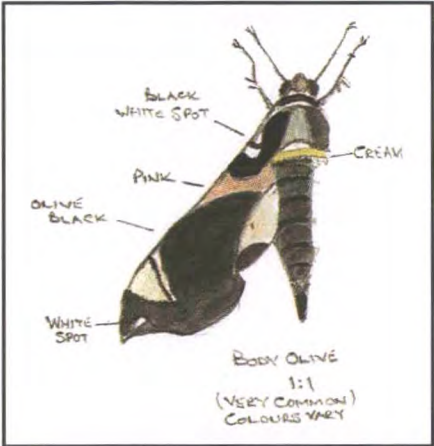


(a) *Sphinx*



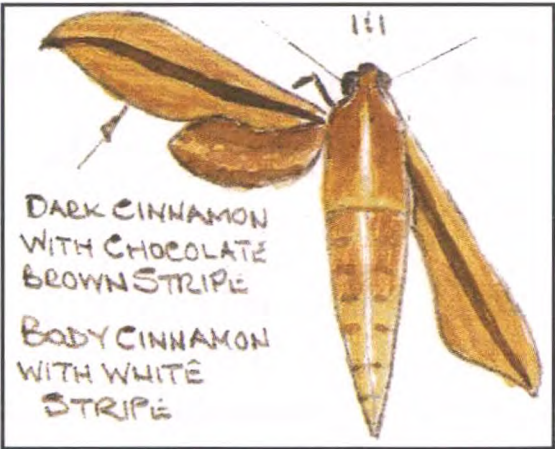
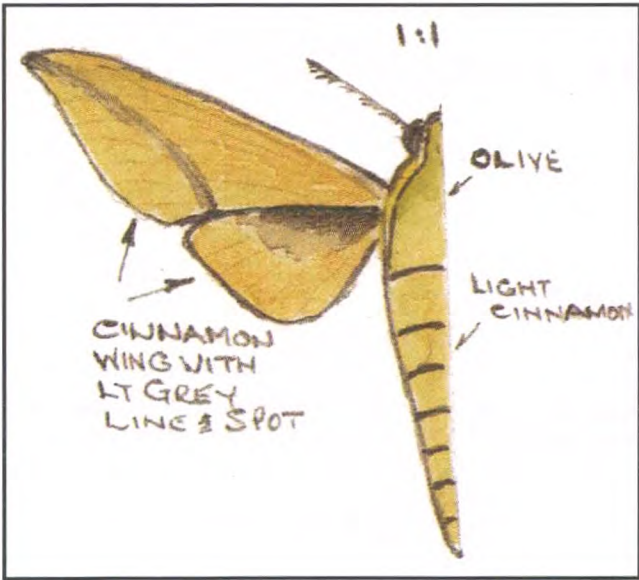
(b) *Theretra nessus* Drury, 1773

Kimbe, Papua New Guinea, on 3 January 1998.



(Note. All figures were originally painted to a scale of 1:1. For the purpose of reproduction here, figures (a), (b) and (c) have been reduced by 50 per cent.)

(c) *Daphnis hypothous pallescens* Butler, at Santos, Vanuatu on 20 January 1998.



(e) *Theretra silhitensis* Walker, 1856

(d) *Theretra clotho celata* Butler

Alotau, Papua New Guinea on 26 and 27 January 1998.

## October–December 1998: a stormy period for the UK

During the final quarter of 1998, northern areas of the UK and the North Atlantic Ocean were affected by several vigorous depressions.

Observing ships recorded the effects of three in particular: the first, on 24 and 25 October, was followed by that of 8 and 9 November, and finally 26 and 27 December; the tracks of these depressions are shown in Figure 1.

### 24–26 October

A deep depression moved east-north-east across Scotland on the 24th and out into the North Sea early on the 25th where it became slow moving before heading away north-east later in the day. Table 1 shows conditions experienced by the R.R.S. *Challenger* (59° 20' N, 01° 00' E), the semi-submersible drilling rig *Santa Fe Rig 135* (57° 04' N, 00° 16' W), and the crane barge *Thialf* (58° 42' N, 02° 54' E).

**Table 1. — Weather conditions experienced between 24 October and 26 October 1998. (Wind direction as supplied by ships' observers.)**

DATE AND TIME (UTC)	LOCATION	WIND		PRESSURE	WEATHER
		DIR 'N	SPEED (kt)		
24/1200	<i>Thialf</i>	180°	(20)	992.4	Fair
1800	<i>Thialf</i>	140°	(37)	984.3	Mod. rain
25/0000	<i>Thialf</i>	150°	(28)	962.0	Rain
0600	<i>Thialf</i>	150°	(17)	962.6	Rain
	<i>Challenger</i>	—	—	959.8	—
	<i>Santa Fe Rig 135</i>	SSW	20–23	1000.1	Cloud
1200	<i>Thialf</i>	050°	(13)	965.6	Rain
	<i>Challenger</i>	330°	35	967.2	—
	<i>Santa Fe Rig 135</i>	SSE	36–44	992.1	Rain
1800	<i>Thialf</i>	320°	(42)	974.9	Hail shower
	<i>Challenger</i>	315°	35	977.5	—
	<i>Santa Fe Rig 135</i>	SE	38–42	968.5	Rain
26/0000	<i>Thialf</i>	340°	(35)	983.0	Mod. rain
	<i>Challenger</i>	315°	30	984.0	—
	<i>Santa Fe Rig 135</i>	WNW	24–28	964.1	Rain
0600	<i>Santa Fe Rig 135</i>	NW	48–52	966.3	Rain
1200	<i>Santa Fe Rig 135</i>	NW	64–68	977.5	Cloud
1800	<i>Santa Fe Rig 135</i>	NW	40–44	986.9	Cloud

*Notes.* Wind speeds in parentheses are corrected to 10-m level. The *Thialf* is a non-UKVOF vessel.

As the depression approached during the 24th and the early hours of the 25th sustained falls in pressure were noted. The *Santa Fe Monitor* in position 57° 18' N, 01° 54' E recorded a continuous fall averaging 2.2 mb per hour over 18 hours, while the *Santa Fe Magellan* in position 56° 54' N, 01° 08' E, averaged a fall of 2.4 mb per hour over 18 hours. (Between 1500 and 1700 on the 24th, the pressure was falling by 5 mb per hour at this location. Figure 2.) During the afternoon of the 25th, when the fronts associated with the depression had passed these two locations, both recorded rises in pressure averaging approximately 1.8 mb per hour over a period of 12 hours. On the *Santa Fe Rig 135* the Barge Engineer P. Morris, noted that the greatest sea heights were experienced during the 26th when waves of 13–15 m were observed. Figure 3 shows the position of the depression at 1200 on the 25th.

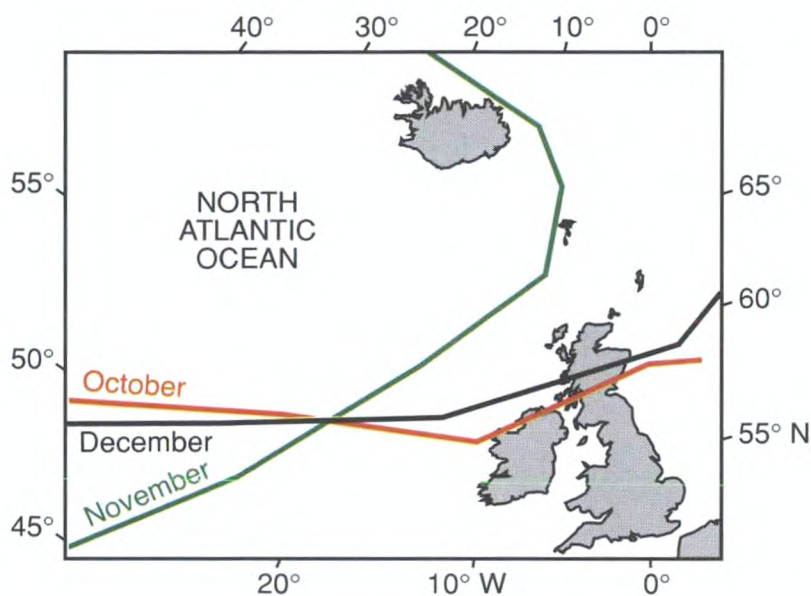


Figure 1. The tracks of three deep depressions which affected the UK during the last quarter of 1998. The portions of tracks shown cover the following periods: 23 to 25 October (red). 8 to 11 November (green). 26 and 27 December (black).

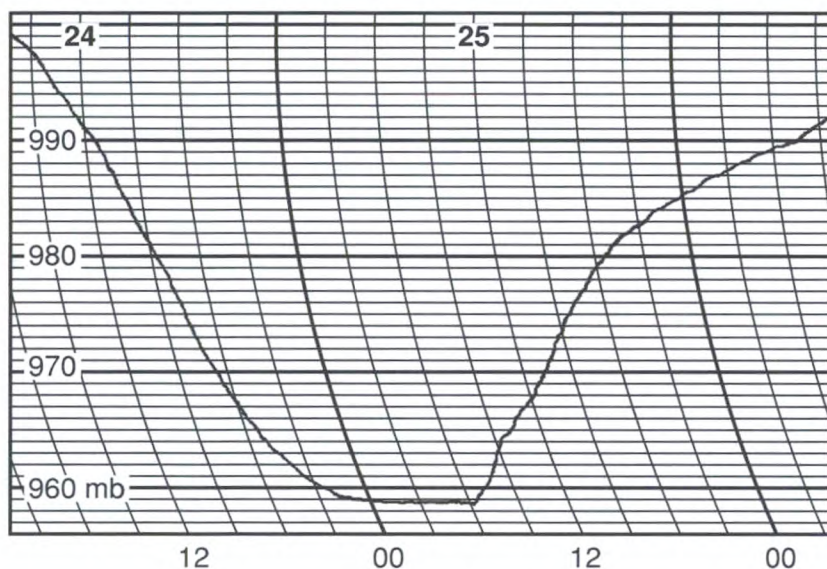
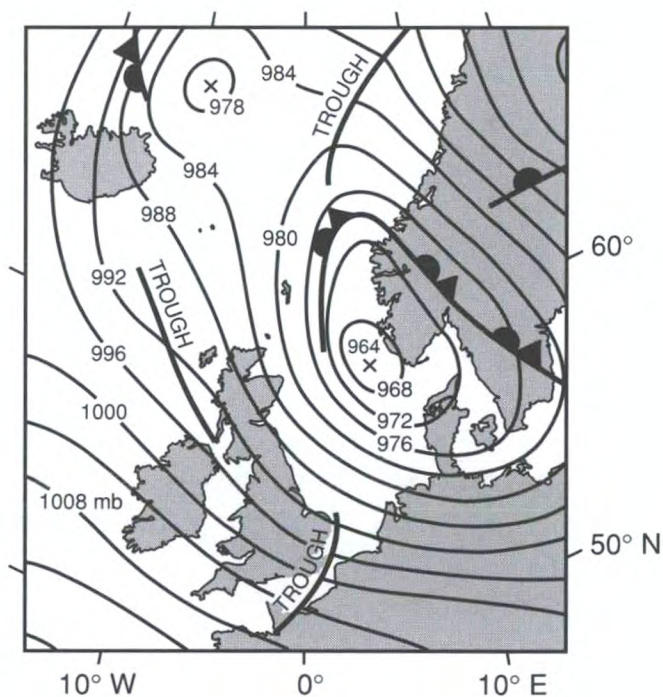


Figure 2. Barograph trace for the *Santa Fe Magellan*, 24/25 October.

Figure 3. The synoptic analysis for 1200 UTC on 25 October.



8–11 November

The storm affecting waters to the north-west of the UK at this time began life as a depression in the southern Caribbean Sea towards the end of October, and then developed into one of the strongest and most devastating hurricanes ever recorded in the region. Hurricane ‘Mitch’ peaked with winds of 180 m.p.h. as it moved north and then west towards Central America. The winds started to subside as Mitch turned south and slowly spread its mass of cloud and rain across Honduras. Even after apparently dissipating over Mexico, Mitch made a comeback several days later, reforming as a tropical storm in the southern Gulf of Mexico. Mitch then raced across Florida into the Atlantic and eventually produced very stormy conditions experienced by, among others, the rig *Sovereign Explorer* (approximately 60° 29.81’ N, 04° 21.58’ W), its standby vessel the *Veesea Garnet*, and the rig *Jack Bates* (61° 13’ N, 03° 26’ W). Table 2 shows weather conditions experienced by the *Sovereign Explorer* and *Veesea Garnet*.

Table 2. — Weather conditions experienced between 8th and 10th November 1998

DATE AND TIME (UTC)	LOCATION	DRY BULB	PRESSURE	WIND		VISIBILITY (N. MILE)	SWELL (M)	REMARKS
				DIR°N	FORCE			
08/1200	<i>Veesea Garnet</i>	—	994.0	S	6-8	5	6/7	Rough sea. Occasional rain. Rough sea. Occasional rain. Rough sea. Occasional rain.
2000	<i>Veesea Garnet</i>	—	998.0	S×E	7/8	10+	5/6	
09/0000	<i>Veesea Garnet</i>	—	995.0	SE	6/7	10	Mod	
0300	<i>Sovereign Explorer</i>	2.5	990.0	SE×S	8	8	4	
0600	<i>Sovereign Explorer</i>	2.6	982.0	SE	10	4	8	
0900	<i>Sovereign Explorer</i>	2.5	973.0	SE	11	5	10	
1200	<i>Sovereign Explorer</i>	2.5	969.0	SE×S	11	3	10	
1500	<i>Sovereign Explorer</i>	2.5	969.0	SE×S	11	3	8	
1800	<i>Sovereign Explorer</i>	2.5	972.0	W×S	12	3	11	
2100	<i>Sovereign Explorer</i>	2.5	981.0	W×S	11	5	9	
10/0000	<i>Veesea Garnet</i>	—	985.0	WSW	8–10	10	—	Very high sea/swell. Squalls.
1200	<i>Veesea Garnet</i>	—	997.0	W	7/8	10	7/8	

Note. The *Veesea Garnet* is a non-UKVOF vessel.

The most severe conditions to affect the rig *Jack Bates* occurred between 1800 on the 9th and 0500 on the 10th. By 1800 on the 9th the wind had veered to 245° from 150° and, with the rig heading 225°, extremely heavy seas were felt around the bow area, two portholes were smashed and there was also damage to rails and gratings which were either destroyed or distorted. Six large waves occurring during the above period were responsible for the damage; they were estimated to be double the ‘normal’ size, coming up to the radio room portholes and therefore

having heights in excess of 18 m. Figure 4 shows the barograph trace from the *Jack Bates* during the 9th and 10th. Figure 4(a) shows the synoptic analysis for 1800 UTC on the 9th.

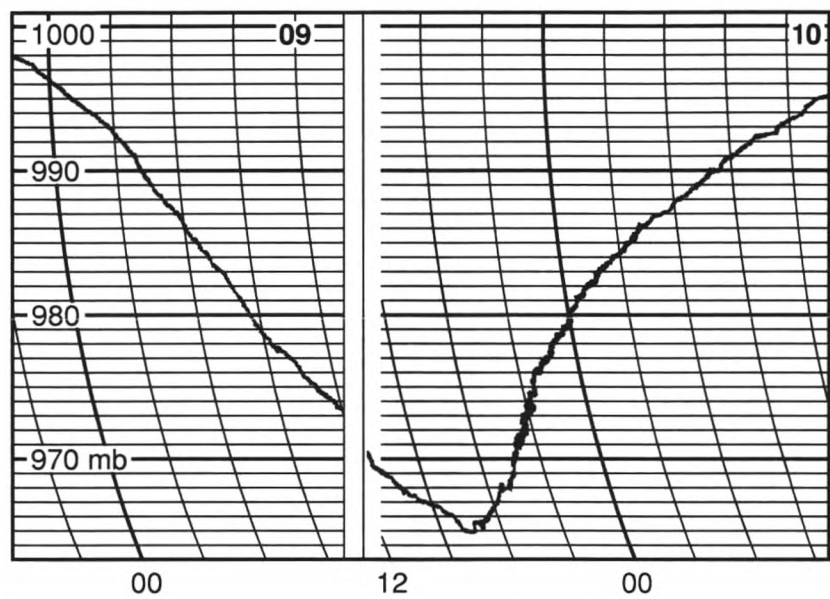


Figure 4. Barograph trace for the *Jack Bates*, 9/10 November (this storm was formerly tropical storm Mitch ((formerly hurricane Mitch)).

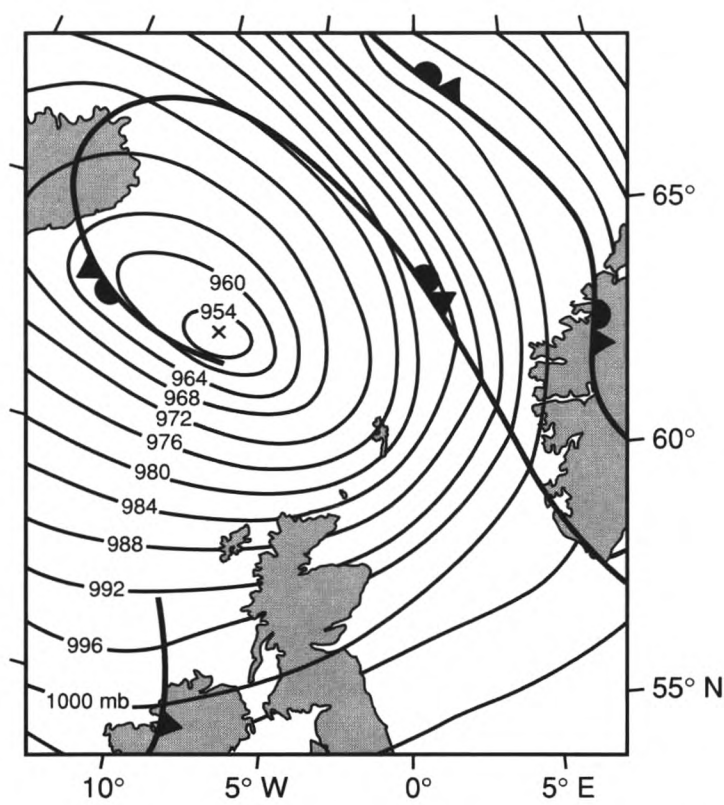


Figure 4(a). The synoptic analysis for 1800 UTC on 9 November.

## 26 and 27 December

The offshore industry also provided details of the next notable depression to affect the UK. The storm blowing in from the Atlantic in late December crossed the UK during the latter half of the 26th and, not surprisingly, found itself labelled the Boxing Day storm. By 0000 on the 27th the storm had moved into the North Sea.

There, the *Matco Clyde* was in position  $57^{\circ} 58' \text{ N}$ ,  $02^{\circ} 15' \text{ E}$  on passage from the Beryl oil field. At 1200 UTC on the 26th the pressure was noted to be falling when the midday observation was compiled and a fall of 7.5 mb was recorded in the report. The pressure continued to fall steeply (Figure 5) until 0200 on the 27th when it started to level off, the minimum pressure recorded by the precision aneroid barometer being 955.4 mb.

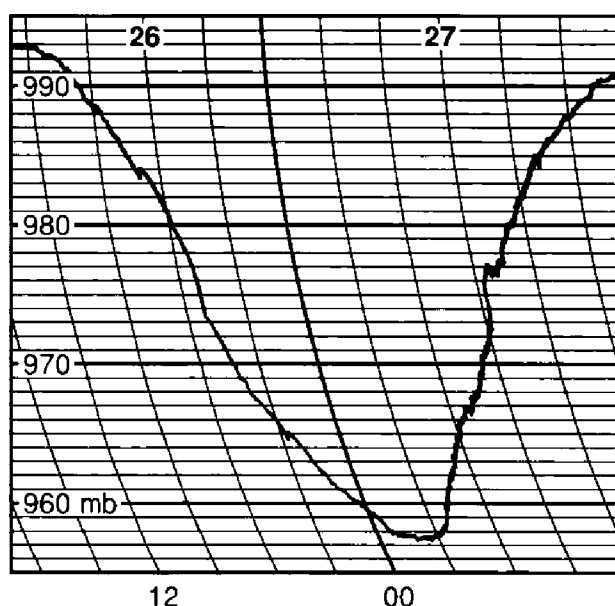


Figure 5. Barograph trace for *Matco Clyde*, 26/27 December.

At 0300 the wind was SSW'ly, force 10, veering, and the sea was very rough with a heavy swell of 10–15 m. These conditions reduced the ship's speed to 2.5 knots at Full Ahead, whereas in normal conditions a speed of 11.5 knots would have been attained under the same setting. Twenty minutes later the wind was SW'ly, force 6 and the pressure was 956.0 mb, while at 0340 the wind had increased to SW'ly, force 9 and the pressure was 957.4 mb. The *Santa Fe Magellan* at  $56^{\circ} 58' \text{ N}$ ,  $01^{\circ} 52.2' \text{ E}$ , and the *Santa Fe Monitor* at  $57^{\circ} 18' \text{ N}$ ,  $01^{\circ} 54' \text{ E}$  saw their barograph pen arms stay within the working area of their barograph charts but the observers on the rig *Santa Fe Rig 140* at  $58^{\circ} 00' \text{ N}$ ,  $00^{\circ} 18' \text{ E}$  and the f.p.v. *Vigilant* at  $58^{\circ} 16' \text{ N}$ ,  $06^{\circ} 20' \text{ W}$  watched as their pen arms went off the scale as the pressure dropped. At *Santa Fe Rig 140* the maximum seas and wind were experienced between 0900 and 1100 on the 27th, the wind having veered WNW'ly at 0600, force 11/12 giving maximum gusts to 90 knots and seas of 13–14 m. The minimum pressure recorded by precision aneroid was 952.4 mb, corrected.

## Acknowledgement

We are grateful to all the observers who took the time to send in their observations of the depressions mentioned in this item, and to Julian Heming (Forecasting Systems, The Met. Office) for additional material on hurricane Mitch.

## Rare whales from the Arctic sighted in mid-Atlantic

25 April 1998

The *Baltic Breeze* (Wallenius Lines, Japan Ltd) under the command of Captain William Yeo, was *en route* to New York from Bremerhaven on a heading of 255°. After a spell of settled weather courtesy of a small ridge of high pressure, the cloud was now increasing while the wind started to pick up from the south-by-east ahead of an approaching warm front. At 1200 UTC boat and fire drills were carried out, followed by a briefing on the exercises; with all personnel assembled on the bridge, attention was focused on the post-exercise analysis. The vessel, although at a point nearly equidistant between the edge of the Grand Banks and the Azores (43° 23' N, 38° 24' W according to the logbook), was still within forecast ice limits even though the sea-water temperature was almost 16°, and the Master therefore remained aware of the potential for ice hazards even though no visible ice had been reported by his officers.

Suddenly, the discussions were abruptly interrupted by sounds which resembled gunshots cracking through the air and, for a split second, the idea that there might after all be ice in the vicinity occurred in many minds. But after the initial crack, the noise was perceived as more of a continuous 'pounding' sound, therefore the presence of ice was swiftly discounted.

With eyes and ears finally synchronised, all eyes turned towards the source of the sound, abeam on the starboard side and about three miles off, where three or four huge white tails continuously beat the surface of the water. Whales!

Post-exercise briefings went out of the window as everyone tried to get a view of, and voice an opinion about, the species of whale causing the disturbance. The pandemonium of the Wall Street Stock Market would have been hushed by comparison, outstripped by the animated conversations on board *Baltic Breeze*.

The whales were black and white, as shown in Figure 1, and so the natural suggestion that they were Killer whales was made by some watchers.

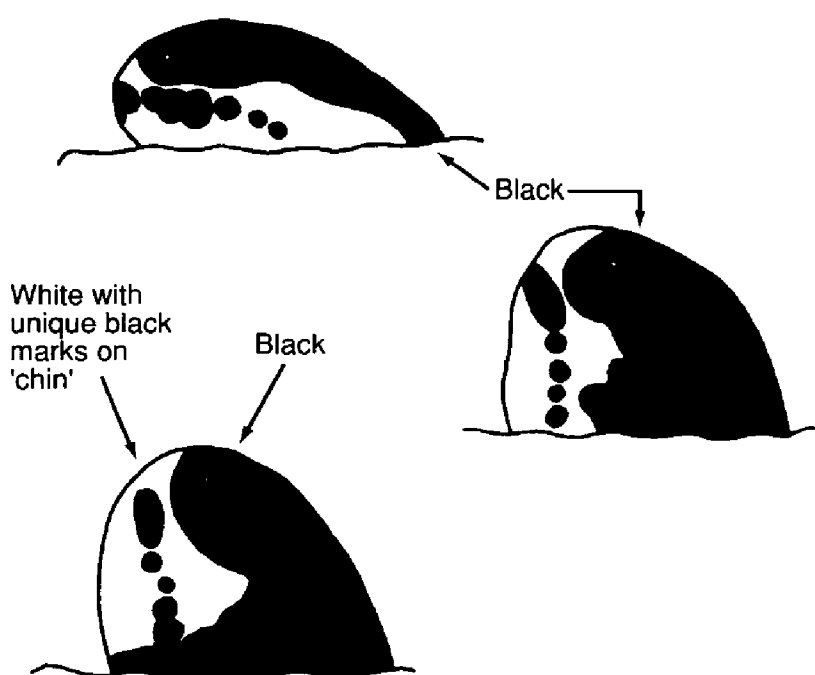


Figure 1. The whales observed from the *Baltic Breeze*.

These whales were 9–12 metres long, though, possibly longer. Some of the less ‘whale wise’ on board said they were dolphins, while others suggested either Humpbacks or Fin whales, either of which species would not have been unusual for the area. However, Captain Yeo and his Third Officer Mohd Ramawan Bin Abdul Samad were sure all the suggestions were wrong; the unique bead-like black marks on the whales’ ‘chins’ were like nothing they had ever seen before. (Indeed, when the report was later written up in the ship’s logbook, Captain Yeo specifically commented that the whales were nothing like Killer whales that he had seen in TV programmes, movies or ocean aquaria.)

The ship’s priorities then regained importance and the diversion was forgotten as order was restored and the briefing resumed, but after its completion the whales were still in evidence and the Master and Third Officer were able to continue watching them.

They noticed one of the whales, which was assumed to be a female, flapping her flippers in the middle of the group and then ‘break-dancing’ by twirling and swirling on her sides before suddenly disappearing to be followed by her companions, the whole group heading generally northward. It seemed to those watching that they could have been mating but they were not seen again. From start to finish, the whales were present for 25 minutes at the most, and during the periods in which they were actually watched, no blows were seen.

### **Discovering the whales’ identity**

When the ship’s completed logbook was received in Bracknell nearly two months after the event, the Additional Remarks pages were copied as usual, and the report duly made its way to the editorial staff of *The Marine Observer*. Nothing like this had ever been reported in UKVOF logbooks before, and a check through reference books revealed the possibility of the species being Bowhead whales, not only extremely rare but also well south of their normal range. The ship’s position was checked and verified, this task made easier by the fact that her weather ‘ob’ for 1200 UTC on 25 April appeared on the midday surface synoptic analysis chart drawn up by forecasters at the National Meteorological Centre in Bracknell. Internet sources of information were sought concerning ice conditions for the area, while the site of the American Cetacean Society revealed a page about Bowhead whales. Upon contacting the society, Mason Weinrich gave a tentative identification of Bowheads but more information was requested, especially from any of the observers ‘first hand’. The next problem, then, was to find Captain Yeo or his Third Officer. A check of the UKVOF observer database indicated that Captain Yeo was still on *Baltic Breeze*, and so her next arrival at Southampton was eagerly awaited, while the Port Met. Officer was on stand-by to ask Captain Yeo about his sighting in April. Complications arose when it was discovered that Captain Yeo had moved to another ship, and his Third Officer had left the sea!

Efforts to trace Captain Yeo proved fruitless; however, as a well-known contributor to the Additional Remarks pages of logbooks, it was felt certain that he would ‘surface’ in due course. In the meantime the hunt for a positive ID for the whales continued. The report had been sent to several UK-based organisations for cetacea, and in February 1999 the following comments were received from Dr Mark Simmonds, Head of Science at the Whale and Dolphin Conservation Society:

“I agree that the drawings look like Bowheads (the line of bead-like spots is meant to be very characteristic). I note that the tail has a white edge rather than being white but this fine point is unlikely to be significant!

“And unless I am misreading the co-ordinates, they do seem to be rather far south. However, I am not a Bowhead expert and one of the great truths about whales is that they always surprise us, and there is no law that says they have to stay in one place, especially as ocean water current must be changing now in accord with global warming.

“ ‘Tail-slapping’ — the first behaviour described — seems to be common in many cetacean species but unfortunately we do not know what it means. Indeed, it may well mean different things in different contexts! As to the rest of the behaviour reported, I do not know.

“However, I think that this observation may be significant because this is a very rare species (greatly depleted by whaling) and urge you to seek more information.”

Progress at last! Another leap forward was made when Captain Yeo sent in a logbook from Cast Line (Liverpool) Ltd’s *Cast Elk*, and we were at last able to write to ask him about his sighting. In the best detective tradition, no pre-suggestion of the species was made to Captain Yeo who, evidently intrigued by the interest, then undertook his own book-based research whilst on shore leave. We were delighted when he contacted us to say that, in his opinion, what he and his Third Officer saw were Bowhead whales.

We now had a convinced observer, and a very constructive comment from an acknowledged source of expertise but the positive ID had yet to be found.

In the absence of replies from other possible sources of information, a further check of marine-related web sites produced the well-known Woods Hole Oceanographic Institute, and from there Dr William A. Watkins provided exactly what we were hoping for. He told us:

“I agree with your other informant and with Captain Yeo. These whales were likely Bowheads. The closest population we know of is in Davis Strait, so these probably came down with the ice and stayed to enjoy warmer weather.

“My experience with Bowheads includes two seasons in 1989 and 1990 in the Canadian and Alaskan Arctic. We tagged 15 Bowheads, at the end of the summer feeding season with radio tags south of Banks Island, and tracked them as they passed along the Alaskan coast and into Russian waters (at that time we had to abandon the tracks because of politics). We actually put an antenna on Little Diomed Island to try and see if any would come back and pass to the south. Unfortunately, the high school students who had agreed to monitor the receivers got bored, so we do not know if any whales did pass by in the weeks afterwards.

“They are unique whales, and I congratulate all on identifying them — not a whale that most people get a chance to see!”

## **Acknowledgment**

Our thanks to Mason Weinrich, Mark Simmonds and William A. Watkins for their help in identifying this species, none of which would have been possible without the original very lucky observation made by Captain Yeo and his Third Officer.

Do readers have any theories about what the whales were doing, and why they were so far south of what is accepted as their normal range?

## The 1998 Leonids

Table 1 (overleaf) shows ships' observations of the Leonids meteor shower of 16/17 November 1998. Those observers under favourable skies were treated to a spectacular display above and beyond the 'normal' sightings of the occasional meteor or fireball.

### **An assessment by Neil Bone, of the British Astronomical Association \***

There were high expectations that the 1998 Leonids, quite closely following the perihelion return of the stream parent (Comet 55P/Tempel-Tuttle), would produce exceptional rates, and perhaps even a storm. Very much enhanced activity was, indeed, seen — unexpectedly early, in the morning hours of Tuesday November 17, and favourably for the UK. For once, the mid-November weather proved reasonably cooperative for observers in the British Isles. High pressure to the east maintained a cold northerly airflow bringing reasonably clear skies for a couple of nights around the time of maximum, at least on the eastern side of the country. Some observers were able to put in good watches under the best skies for the period in the post-midnight hours of Nov 15–16, finding Leonid activity present at a modest level of 3–5/hr. The bulk of UK observations come from Nov 16–17, which was cold and frosty at most locations. Thin, patchy cirrus cloud was a problem for many, while — particularly in the Midlands — fog caused some difficulties. Nevertheless, those who were patient and waited for the cloud present around midnight to clear in the early morning hours, and heeded the Meteor Section's admonitions to go out and use whatever clear sky materialised on the nights to either side of, as well as on, the expected Leonid maximum, were rewarded with the finest meteor display most of us have seen. East Anglia seems to have had the best skies around midnight UT on Nov 16–17. Even this early, with the radiant low in the eastern sky, it was obvious that the Leonids had become much more active. Bursts of several meteors in quick succession were noted, and many of the events were bright with persistent ionisation trains. Several observers have reported a couple of notable fireballs, at 0015 and 0051 UT, each of which left a long-duration train which distorted in upper-atmosphere winds over the course of a few minutes. As the night went on, this activity continued unabated. Typical rates for a single, experienced observer under clear skies were of the order of 80 Leonids/hr, up to perhaps as many as 120–140/hr. Bursts of eight meteors in a minute, with events often appearing simultaneously or in very quick succession, were common. Provisional corrected Zenithal Hourly Rates come out around 230–250 throughout the night (more than ten times the Leonids' 'quiet-time' 1980s peak level, and three times that for a typical Perseid maximum). Reports from overseas suggest that this level of activity was evident from as early as Nov 16d 17h UT, and continued until dawn broke over the western United States around Nov 17d 12h UT.

There were numerous exceptionally bright fireballs. Another facet of the night's activity on which many have commented was the frequent occurrence of flashes produced by events outside the field of view, often lighting up sky and ground.

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\* Extracts from 'The 1998 Leonids: a preliminary report' by Neil Bone, reproduced from the *Journal of the British Astronomical Association*, **109**, 1, 1999, p.3, by permission of the editor.

Table 1. — Ship observations of the Leonid meteor shower — 16/17 November 1998

SHIP	POSITION	TIME(UTC)	NUMBER OR RATE OF FALL	TRAIL OR TRAIN*	REMARKS
<i>Botany Bay</i>	10° 02' S, 80° 40' E	1900–2200	50+	Trains visible many seconds after meteors burned up.	Very bright. Falling NE–SW; elevation 40° to 20°.
<i>Shenzhen Bay</i>	11° 59' N, 52° 00' E	2000–0000	40/min, then 60/m.	Green train behind some larger meteors.	Trains dispersed after one minute.
<i>Berlin Express</i>	18° 27' S, 05° 02' E	2300–0500	Several hundred.	Trains from brightest meteors still visible after 5 min.	Very bright, like lightning. Falling NE–SW.
<i>Matco Clyde</i>	57° 12' N, 01° 39' W	0000 onwards	Up to 15/min. Single, pairs, groups. Decreasing to 3 or 4/min by 0430.	'Smoke' trails after particularly bright meteors.	Falling from south of Polaris (East). Some bright enough to light bridge wing. Three or four tracked across half sky before exploding.
<i>City of Sunderland</i>	43° 01' N, 08° 33' E	0000–0530	—	Some trails 5° to 10° long.	Some bright enough to light sky like lightning.
<i>Maersk Surrey</i>	26° 10' N, 53° 45' E	0030–0145	Hundreds.	—	Bright enough to hurt the eye. Sky lit as if by sheet lightning.
<i>Chiquita Bremen</i>	24° 30' N, 52° 40' W	0400–0600	Continuous stream.	—	Sky lit as if by sheet lightning.
<i>Queen Elizabeth 2</i>	16° 03' N, 02° 09' W	0400–0800	Hundreds.	—	Travelling in various directions but mainly east to west.

Table 1. (*cont*)

SHIP	POSITION	TIME (UTC)	NUMBER OR RATE OF FALL	TRAIL OR TRAIN*	REMARKS
<i>Berge Atlantic</i>	18° 00' N, 18° 00' W	0420–0531	211 in east.	Some trails lasting 20 seconds; one lasting 10 min.	Overall, approx. 25 per cent showed glowing trails visible for up to 90 sec after flash.
		0613–0650	140+	—	Last meteor sighted was bright, and an intense green colour for final 2 seconds.
<i>York</i>	02° 11' N, 27° 57' W	0600–0800	—	Short-lived trails (about one second).	Initially thought to be lightning in clouds until clearance revealed a “grand spectacle”. Very fast-moving. Extremely bright. Concentrated in NE quadrant but visible all-sky.
<i>Eagle</i>	14° 26' N, 66° 39' W	0830 onwards	Single, followed by peak of 30–40 in 10 min. Then 2 or 3 in 5 min towards dawn.	Single one showed green and yellow tail.	First thought to be distant lightning. At peak, comparison was made to a “fireworks show”.
<i>OOCL Bravery</i>	58° 50' N, 07° 18' W	All night.	—	—	Mostly travelling east to west. Some bright enough to light up sky on burning up.

(\* The British Astronomical Association offers the following advice to observers regarding the difference between meteor trails and persistent trains:

“A night-time meteor train appears as a faint nebulous streak of light left behind, along the track of a meteor, but *after* the meteor itself has extinguished. Do not mistake it for the actual moving streak of a fast meteor — this is the trail. Momentary meteor trains are generally likened in appearance to the vapour wake of a jet aircraft, and are only left by about one-quarter of all meteors. Meteor trains lasting more than a few seconds are quite rare. Statistically, one must observe about 600 meteors to observe a train of 10 seconds’ duration or more.”)

At least 46 per cent of the Leonids recorded on this night left behind persistent trains. Most were of a few seconds duration, but there were many whose fade took several minutes. The high activity plateau on Nov 16–17 arrived earlier than anyone had forecast. The expectation had been that we might see activity begin to build around dawn (for western Europe) on Nov 17, with a broad span of Perseid-level activity surrounding a sharp peak around closest passage to the stream orbit's node around Nov 17d 20h UT. Observers who travelled to Asian longitudes — including a party in India, led by the Section's Assistant Director John Mason — found lower rates at this time than had been seen 16 hours earlier! Leonid activity had dropped from the plateau to about 40/hr by the evening of Nov 17 — far from the storm or 'grand display' rates which many had hoped for, but still above the levels found in a more normal year. The night of Nov 17–18 proved frustrating for those of us back in Britain, too, with cloud and patchy rain afflicting most areas except East Anglia and Kent. Where skies were clear, rates of 10–15 Leonids/hr were found after midnight, clearly further diminished from those seen by observers in Asia. Bright events were also much less common on this night. A handful of reports show Leonid activity dwindling away up to Nov 19–20. In light of the unexpectedly early, high activity on November 16–17, many are now revising their forecasts as to whether there will be a major display in 1999. I remain confident, however, that we should see at least a grand display around the time of node-passage (roughly Nov 18d 02h UT). The very high activity outbursts are associated with narrow filaments of material within the more extensive near-comet debris cloud. Historical studies suggest that the 'storm' filament lies outside 55P/Tempel-Tuttle's orbit, and will be encountered increasingly late in numbers of days behind the comet with increasing distance between Earth and the node at the time of closest approach. In 1998 we did not arrive far enough, in days, behind the comet to encounter this filament. A broadly similar situation obtained in the 1960s, such that although Earth passed closest in days behind the comet to the node in 1965, the highest activity was actually a year later. The volume of near-comet space through which we passed in 1998 contained mainly larger meteoroids, ejected by the comet several revolutions ago; the still more abundant, smaller material probably lies further downstream in the region we should pass next November 18. Overall, 1998 must go down as perhaps the most successful observing run the BAA Meteor Section has ever enjoyed for the Leonids. Up to the time of writing, in early December [1998], more than eighty sets of results had been received, amounting to many thousands of meteors. Time has not yet permitted a detailed formal analysis; this will have to wait until the spring when all the data have been gathered together. There can be little doubt, however, that many will be talking about the morning of 1998 November 17 — the 'Night of the Fireballs'! — for a long time to come.

### **Acknowledgements**

We are grateful to all the observers who sent in their sightings, and to Dr Neil Bone, Director of the British Astronomical Association Meteor Section, for his help in compiling this article.

## Special Long-service Awards for the year ending 31 December 1997

Shipmasters who have contributed a minimum of 18 years service to the UK Voluntary Observing Fleet become eligible for nomination to receive a Special Long-service Award in the form of an inscribed presentation marine barograph.

Observing careers to the end of 1997 have been assessed and placed in order of merit according to a formula which takes into account the length of service, the number of logbooks submitted and, more importantly, the quality of their contents. As with the awards presented for 1996, all the recipients hail from a single company, again P&O Nedlloyd Ltd; they are:

CAPTAIN P.D. DAVIES whose first logbook was received from the *Chindwara* (British India S.N. Co. Ltd) in 1966.

CAPTAIN J.G.W. DIXON whose observing career began as a cadet on the *Glenclyde* (Ocean Fleets Ltd) in 1970.

CAPTAIN K.S. HARDY whose first logbook was received from the *Flintshire* (Ocean Transport & Trading Ltd) in 1974.

CAPTAIN J.W. WELCH who began his career with the P&O Line in 1962, on *Stratheden*, and retired from P&O Nedlloyd Ltd towards the end of 1997.

On a date to be arranged, the four recipients will be invited to The Met. Office Headquarters at Bracknell to receive their awards at a special presentation.

## Personalities

RETIREMENT — CAPTAIN B.N. JONES retired in May 1999 at the end of a career spanning 42 years. Born in Heswall in 1939, Brian Norman Jones was educated at Birkenhead School and from there joined Alfred Holt & Co. as an indentured apprentice.

His first ship was the *Denbighshire* (Glen and Shire Line) which he joined at King George V dock in London in October 1957. He recalls that the ship's crew was Chinese and that he arrived in the half-deck, somewhat bewildered, only for the Quarter Master to come along and ask that, if he did not smoke "could he have my ration of cigarettes?"

Captain Jones sailed on a variety of Blue Funnel and Glen Line ships on their regular runs to the Far East, Indonesia and Australia, during which time he gradually progressed through his tickets. In 1967, shortly after obtaining his Masters ticket, he started to sample the delights of West Africa (with the merger of Alfred Holt and Elder Dempster to become Ocean Fleets Ltd having taken place), also enjoying a spell as Training Officer on the cadet ship *Onitsha*.

Sailing on such vessels as the *Bhamo* and the *Glenfalloch* between 1974 and 1977, he then came ashore for a year to assist with the planning for the Ocean Fleets venture into RoRo shipping with the Barber Blue Sea Line before sailing on their vessels for several enjoyable years. Captain Jones says of this period that his only regret was that the ships reported for the Hong Kong VOF, and that his

services did not contribute to his UKVOF observing record. However, he does recall receiving an appreciative letter from The Met. Office following his encounter with a rogue wave off Cape Hatteras, for, although the phenomenon was known in the area, few reports of it had ever been received.

Promoted Master in 1987 he joined Acomarit (UK) Ltd two years later following the cessation of Ocean Fleets' shipping operations. Between 1990 and the time of his retirement, Captain Jones sailed on the *Kukawa*, *Kumasi*, *Towada* and *Kagoro* on runs from the UK to West Africa. While not being provided with the most varied of conditions for weather reporting, Captain Jones says that he nevertheless enjoyed encouraging his Ghanaian and Filipino officers to take an interest in what they were doing.

In the future he looks forward to listening to the weather forecasts but only to check for conditions in the hills as he continues to try and tick off the 'Munroes', and we take this opportunity to thank Captain Jones for his observing work, marked by five Excellent Awards being earned between 1993 and 1998, while reaffirming that every observation counts, regardless of its location or transmission destination!

**RETIREMENT** — CAPTAIN STUART M. NORWELL retired from the post of Head of the Observations–Voluntary (Marine) branch of The Met. Office, at Bracknell, on 7 May 1999.



Captain Norwell (centre) and Mrs Norwell, with Dr S.J. Caughey (Technical Director of The Met. Office) on 7 May 1999.

Stuart Morison Norwell trained for the sea on H.M.S. *Conway* and served his apprenticeship with the Donaldson Line from 1956. He had 40 years of experience in The Met. Office, commencing in 1959 with the beginning of what would be a 19-year association with the UK Ocean Weather Ships, based in Greenock. During this period he progressed from Navigating Officer to Master having obtained his Masters certificate in 1965, and was later appointed to the post of Shore Captain at the Greenock base.

The almost inexorable path to Bracknell Headquarters began in 1978 when another phase of his career dawned with his appointment as Port Met. Officer for Scotland and Northern Ireland. Covering all ports in his 'territory' from his base in the Glasgow Weather Centre until 1984 when his office was relocated to

Greenock, he and his assistant tended to the needs of about 600 observing ships and marine shore establishments each year. In 1993 the path to Bracknell delivered him to take up the post of Deputy Marine Superintendent. It might be said that 'phase three' was under way.

He succeeded Captain Gordon Mackie as Marine Superintendent in 1996 and, in the relatively short period to his retirement, he steered what was then known as the Observations (Marine) branch through a period of great change while The Met. Office as a whole continued its metamorphosis into a Trading Fund, and saw it emerge eventually as the Observations–Voluntary (Marine) branch, part of the newly formed Technical Division.

Following his retirement, a family holiday in America was first on the list of leisure pursuits, and he later hopes to indulge his interests in outdoor bowls and fishing. We wish Captain Norwell a long and happy retirement.

Captain Norwell was succeeded by Margaret J. Atkins, formerly Head of the Observations–Plans and Requirements branch.

### **Correction**

In the July 1999 edition of *The Marine Observer*, the author of the article 'Giant icebergs' (page 121) was erroneously printed as Jon Franklin instead of Jon Shanklin. We offer our apologies to Jon Shanklin for this oversight which also occurred in the list of contents for that issue.

## Services for VOF observers

### Observations–Voluntary (Marine)

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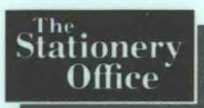
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