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Bottom Temperature and Salinity in the Digitalization sponsored North Sea during the ICES Young Herring by Thünen-Institut Survey in February 1974

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On the basis of the hydrographic observations carried out during the ICES Young Herring Survey in 1974 charts showing the distribution of bottom temperature and salinity in the North Sea have been prepared. From the surveys only the data collected within the month of February were used for the charts. This material, however, was supplemented with observations made by other vessels in February 1974. charts are presented in this document.

Furthermore, a comparison of bottom temperature and bottom salinity in February 1974 with the long-term means was undertaken. As standards were used the February mean charts of the publications referred to below, i.e., the base period is 1902-1954. All stations worked in February 1974 were plotted in enlarged mean charts. The long-term means were interpolated for these points, and the 1974-values were compared to them. The last two figures of this document show the result of the comparison. In the figures isanomals of bottom temperature and bottom salinity, respectively, have been drawn. Areas of negative anomalies have been hatched in the figures.

From the figure illustrating the distribution of the temperature anomaly it appears that temperature is above normal in most of the North Sea, as was the case also in February 1973. In the western part there are regions of negative anomalies. However, both in the western and northern part of the North Sea the anomalies - they be negative or positive — are small, viz., generally not exceeding 0.5°. In the eastern, southern and, to some degree, the central parts the anomalies are positive and have values from 0.5° to about 1.5°, in the Southern Bight even reaching 2° or more.

The figure illustrating the distribution of salinity anomalies shows much the same picture. In the northern, western and central parts of the North Sea anomalies are small — the numerical value exceeding 0.1% in minor patches only — and fairly evenly distributed between positive and negative values. In the eastern and southern parts, however, salinity is 0.1% to 0.5% above normal, in the outer German Bight and in the Southern Bight even 0.5% to 0.8% or slightly more above.

## References

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