ALGORITHMIC SOLUTIONS
TO THE AMBIGUITY OF EQUITABLE BOUNDARY LINES

Leendert DORST, THE NETHERLANDS
Hydrographic Service of the Royal Netherlands Navy|
LL.Dorst@mindef.nl

Maritime delimitation usually starts with the calculation of an equidistance line, which is often corrected for special circumstances. The correction process aims to produce a line that is "equitable", a concept open to various interpretations. While the equidistance line is calculated by a technical expert, an equitable line is the result of a negotiation process. Technical support is then only necessary to argue that a certain line is equitable indeed.

Algorithmic methods for the correction of the equidistance line have the potential to improve and speed up such negotiations. Instead of selecting the most equitable candidate out of a potentially very large set of imaginary boundary lines, agreement could be reached over a method in combination with setting a small set of methodical parameters. The result is a unique and unambiguous boundary line.

The ABLOS Manual on Technical Aspects of the Law of the Sea identifies several algorithmic methods to correct an equidistance line: the partial effect line; notional basepoints; movement of the equidistance line; the equiratio line; the bisection of the general directions of the two coasts. We identify equiratio as the most flexible, but also the most complicated method. The ideal approach would be a simplification of the equiratio method.

Contentious issues in UNCLOS-based maritime boundary delimitation processes are alleviated using such an algorithmic method, especially in case of island regimes. We will present some ideas for a simplified equiratio method, using several examples.