



MICROCOPY RESOLUTION TEST CHART NATIONAL BUREAU-OF STANDARDS-1963-A

# Development of MILHY for operational forecasting

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AD-A159 575

Principal Investigator	:	Dr. M.G. Anderson	
Contractor	:	Dr. M.G. Anderson	
Contract Number	:	DAJA45-85-C-0011	

The research reported in this document has been made possible through the support and sponsorship of the U.S. Government through its European Research Office of the U.S. Army. This report is intended only for the internal management use of the contractor.

Second Interim Report

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September 1985

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## Development of MILHY for operational forecasting

Following the last report in June 1985 (the first interim report), there have been two major pieces of work undertaken:

- (i) A full version of our modified MILHY package has been forwarded to Waterways experiment Station, Vicksburg, Mississippi, together with test data sets and full documentation; a. L.
- (ii) 3 A visit has been made to Frankfurt, West Germany, to liaise with the 517 Engineering Group of the U.S. Army. During that visit, we sought to identify watersheds in the Fulda area that would provide a suitable data base for further tests of the model. A further visit is planned in October to collaborate with the 517 Engineering Group in the acquisition of streamflow data and topographic and soil maps.

One of the principal difficulties in obtaining suitable data for testing purposes was thought to be the large number of structures on the relatively small rivers in the Fulda area. Figure 1 illustrates the type of structure we found. However, our field work showed that these structures were nothing like as numerous as mapped evidence would indicate. In consequence, initial model testing in this area will require less field monitoring in terms of structures than originally envisaged.

### Proposed work schedule March 1986 - March 1988

Statutes 22 Decas

The terms of the original one year contract (20 March 1985 - 20 March 1086) makes it desirable now to request funding for the final two years of the project (commencing 20 March 1986). In these two years, it is proposed to:

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- i) Configure an optimal version of MILHY with our revised soil water module. This will involve continued close collaboration with W.E.S., having within the last two months forwarded a copy of our program to Vicksburg.
- ii) Enhancement of the tactical elements - including preprocessing of input data to optimise the program runtime.
- Continue development of the soil moisture forecasting iii) segment in the context of tactical forecasting needs.

The research budget for this work would remain exactly as per the original proposal:

## Research budget proposals

	FY86	FY87	FY88
Salaries* (two research assistants)	\$17K	\$35K	\$18K
Travel	\$ 2K	\$ 4K	\$ 2K
Computer charges	\$ 1K	\$ 2K	\$1K
Report production			\$ 2K
	\$20K	\$41K	\$23K

## Total : \$84,000

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INCLUSIVE OF ALL UNIVERSITY OVERHEADS based upon start date of the 21 March 1986

Dr. M.G. Anderson Principal Investigator





Figure 1

