

THE STIRLING BYPASS

Official Opening Ceremony Performed By

THE RT. HON. LORD HUGHES, C.B.E.

Minister of State Scottish Office

Wednesday, May 22, 1974

HIGHWAY AUTHORITY
The Secretary of State
for Scotland
Scottish Development Department

AGENT AUTHORITY
Roads and Bridges Department
The County Council of the
County of Stirling

COUNTY COUNCIL OF THE COUNTY OF STIRLING

ROADS COMMITTEE 1973-74

COUNTY CONVENER — JAMES ANDERSON

Landward Members

Robert Anderson
Mrs Evelyn M. Brown
Andrew Croy
Alexander L. Ferguson
Mrs Alix. C. Fullerton
Hugh Grogan
David R. M. Hill
Robert Howie
John Jenkins
James Johnston
George W. Lynch

Mrs Laura M. McCaig Michael McInally Alexander M. McKechnie John A. G. Mitchell Mrs Lorna E. Montgomery Mrs Catherine M. Organ John Orr W. Watson Peat John Taylor John Y. Valentine

Small Burgh Members

Councillor Gordon W. Stewart, Bridge of Allan. Councillor Thomas Martin, Denny. Councillor Patrick McCafferty, Grangemouth. Police Judge Thomas Crainey, Kilsyth.

Chairman — Mr George W. Lynch.Vice-Chairman — Police Judge Thomas Crainey.

County Clerk

James D. Kennedy, C.B.E., M.A., LL.B.

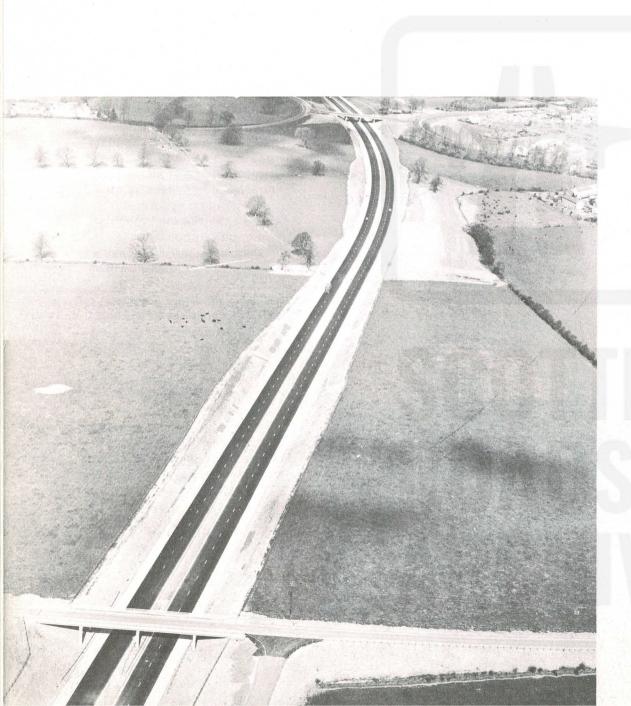
County Road Surveyor

J. Forbes Keith, B.Sc. (Hons.), C.Eng., F.I.C.E., F.I.Mun.E., F.I.H.E.



The Central Scotland motorway network is designed to serve two purposes: to relieve the present inadequate road system and to form the framework of a modern infrastructure necessary for the continuing economic development of the industrial heartland of Scotland. At the same time it will play a vital part in the future growth of the Forth Valley. Forming the Stirling bypass, the latest sections of the M80 and M9 motorways not only fill in key sections of the network but also complete a 450-mile link between Perthshire and London of continuous motorway except for two stretches of dual carriageway. The bypass was built under five contracts on a line extending from the Haggs interchange at

The M9 — Scotland's new scenic route to the North.



Motorway Authority

The Secretary of State for Scotland Scottish Development Department Chief Road Engineer, G. F. Norris, C.Eng., F.I.C.E., F.I.H.E.

Agent Authority for Road and Bridge Works

Stirling County Council
County Road Surveyor, J. F. Keith, B.Sc., C.Eng., F.I.C.E.,
F.I.Mun.E., F.I.H.E.
Deputy County Surveyor, G. I. McCrindle, C.Eng., F.I.C.E.,
F.I.H.E.

Extent of the Works

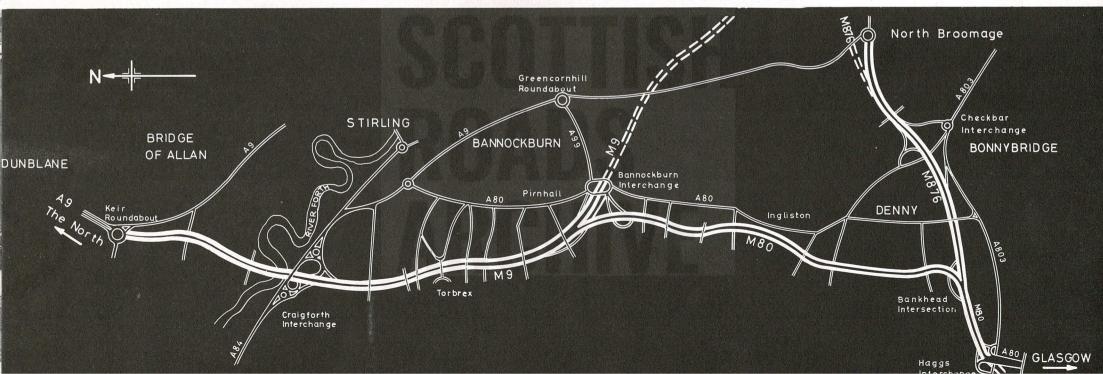
The works include the following, in five contracts: — 1.70 kilometres (1.06 miles) of standard three lane Motorway (M80); 21.70 kilometres (13.50 miles) of standard two lane Motorway (M9 and M80); 6.83 kilometres (4.23 miles) of Connecting Roads; 13.03 kilometres (8.10 miles) of Side Road Diversions and Improvements; 5 Interchanges; 23 Bridges and Underpasses; together with culverts, drainage, retaining walls, bridge reinstatements and ancillary works. Total cost £7,575,502.

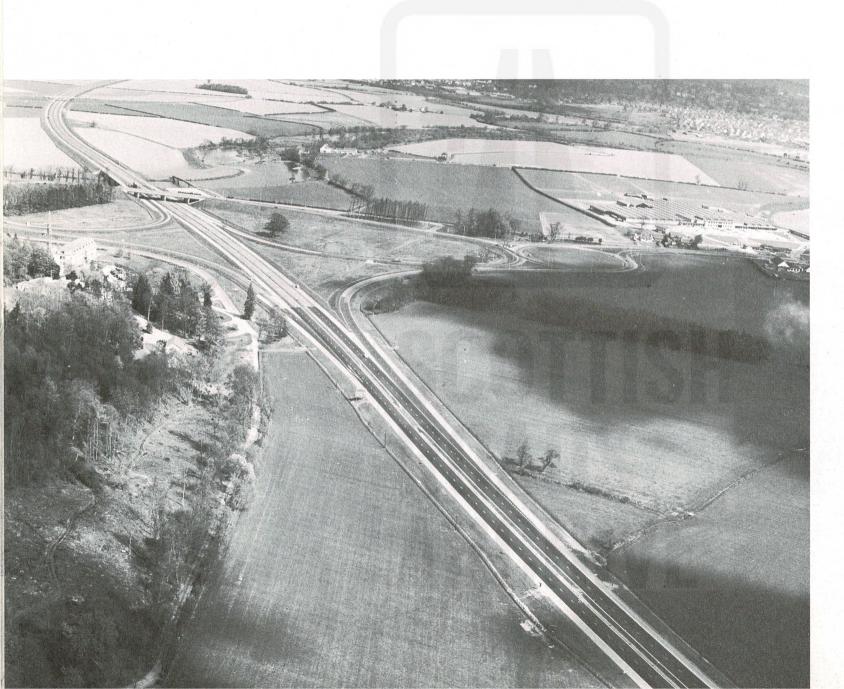
The "corridor" designated 40 years ago between Stirling and Cambusbarron carries the new road northwards.



Twenty three bridges and underpasses were built on the 14-mile long stretch of motorway.

The route of the Stirling Bypass and its connections to nearby communities.





the southern boundary of the county where it begins as the three lane motorway M80, through the Bankhead interchange and its link to Fife via the Kincardine Bridge, and continuing north as a dual motorway by Bannockburn and Craigforth interchanges to the south and west of Stirling finishing, for the time being, at Keir, south of Dunblane. Design and contract supervision of the motorways, bridges, and roads was carried out under the direction of the County Road Surveyor by the County Council of the County of Stirling as agent authority for the Secretary of State for Scotland.

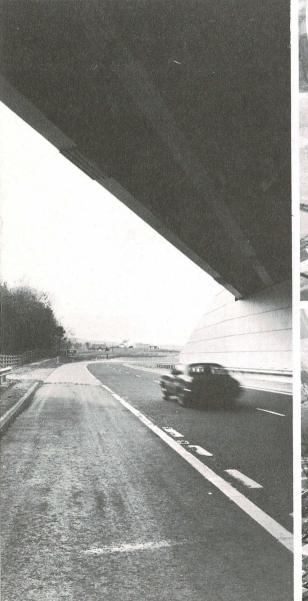
The line of the bypass was controlled by four factors: a crossing of the river Forth, the fourth road crossing upriver;

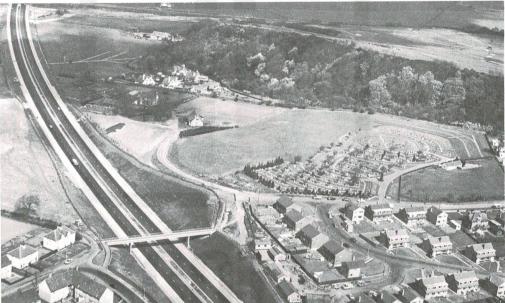
Craigforth interchange to the northwest of Stirling. The river Forth close by is popular with fishermen and the cattle market (right) is one of Scotland's largest.



the corridor left between Cambusbarron and Stirling by agreement between the town and county councils in 1932; the demands of a link to the existing road system south of Stirling; and the need to connect with the A80 at Denny. For the roadbuilders the carseland proved a challenge. Alluvial deposits of the river valleys of highly compressible silts can cause uneven settlement of embankments. Over nine months, Stirling County Council's engineers built a trial embankment section by section to a height of 35 ft. The first of its size to be built on carseland in Scotland, the experimental embankment proved successful and is now integrated with the motorway between Craigforth and Keir. To key in the motorway to the

Bannockburn interchange south of Stirling provides safe and easy access to the motorway network.

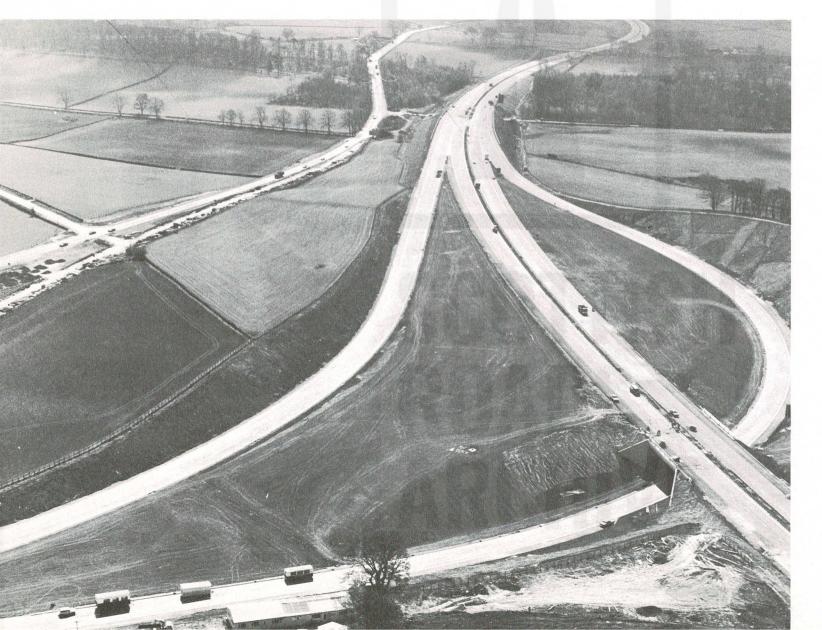






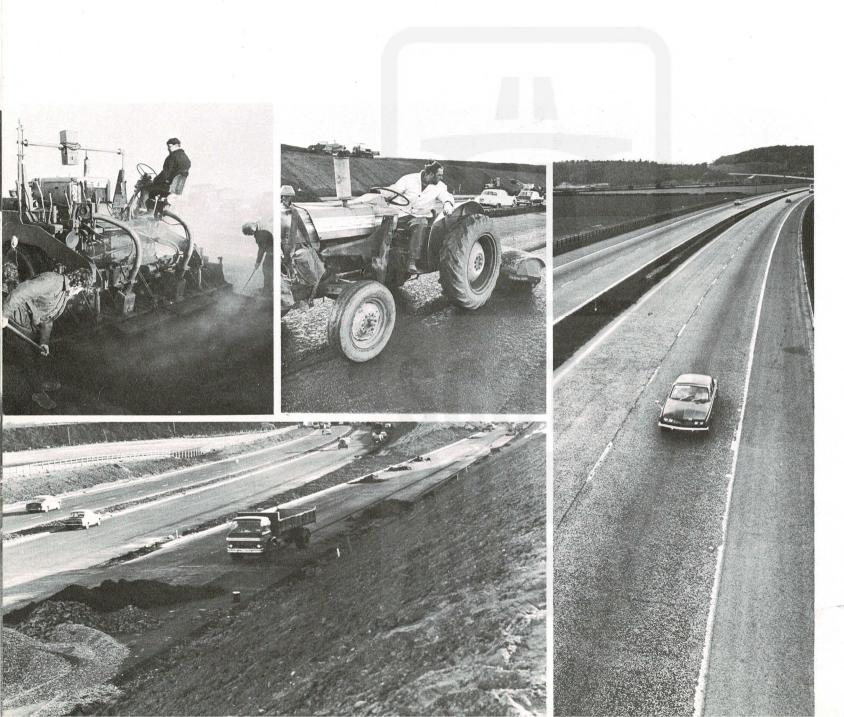
road system south of Stirling, the design engineers worked out 13 different schemes. Each one had to take account, among other problems, of the old coal mines worked over hundreds of years. The eighth design was the one finally selected and the Bannockburn Interchange was born. During excavation work at the Bannock Burn, an artefact was uncovered. Rumour spread that it was the shaft of Bruce's sword lost early in the battle, while antiquarians in Edinburgh said it might be an iron used for reaming out the touchholes of cannon. The bypass runs through rich agricultural land and to minimise the effect of the motorway on farm economy three accommodation bridges have been built to allow

Designers made every effort to ensure that the motorway did not become a physical barrier between the historic town and the communities to the west by providing road and pedestrian bridges.



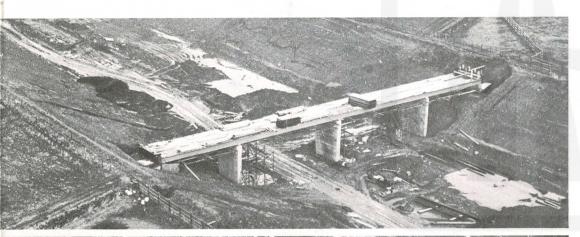
farmers easy movement of beasts and machinery. Disturbance of property was kept to the minimum and demolition was confined to a lean-to farm outbuilding, a barn, and some hen houses. Rights of way have been preserved and in one case rerouted to cross a combined pedestrian and service bridge. Stretches of the road are formed on embankments above the level of surrounding countryside offering motorists travelling north unrestricted views of the Carse of Stirling, the Town and Castle, the Borestone and the Wallace Monument set against the colourful backcloth of the Ochil Hills. In the distance Ben Ledi and the hills around Callander stand out on a clear day.

Looking south from Bannockburn interchange, the motorway provides a contrast with the present A80.



Bridges played a prominent part in the construction of the motorway. Seven underbridges carry the motorway over other roads, and the river Forth and Bannock Burn. Over the motorway there are 15 bridges as well as three accommodation bridges, and a pedestrian-service bridge. One underbridge was built at Chartershall village over the Bannock Burn to bypass an existing masonry bridge. Ground conditions along the route varied from thick beds of highly compressible silts underlying the Carse, sand deposits at Cambusbarron, glacial deposits of clay and silts at Chartershall, to old coal mine workings at Snabhead. Mine workings and shafts were excavated, infilled and capped

The motorist is often unaware of the skill which goes into providing a smooth and permanent road surface.







where necessary. Public service lines for gas, water, electricity and telephone had to be diverted including the oil pipe line between the BP ocean terminal on Loch Long and the refinery at Grangemouth. Immediately to the west of the Bannockburn interchange 25 acres have been set aside as a service area and the County Council already have put forward their views on its development to the Secretary of State. In time it is hoped to establish a filling station, cafeteria, restaurant and hotel as well as an overnight camping park for touring caravans and a rest area for long distance hauliers. The M80 is playing its part already in ensuring better roads for motorists in the 21st century with a stretch acting as

a test bed for the Transport and Road Research Laboratory.

Twenty different types of road construction have been laid down in the one length since the dual carriageway was laid in 1963. So far two have "collapsed" while the remainder are still "live" and reaching the peak of their interest to the road scientists who make twice yearly tests.

An extensive landscaping programme will be carried out in 1975 although the County Council's arboriculturist is already planting out in the crib retaining wall to the west of Denny as well as other areas.

The creation of this 20th century route to the north will serve to perpetuate Stirling's reputation as "the gateway to the north."

Features of the motorway construction included road and accommodation bridges and the rechannelling of burns.

