

January 21, 1970

SENATE FILE 1098

Passed on File

*Transportation 1-23, Pass 2-3*

By CLARKE, LAMBORN, HILL,  
ANDERSON, OLLENBURG, BALLOUN,  
POTGETER, COLEMAN and MOWRY  
(Edgington, Stromer, Fischer  
of Grundy, Franklin, Priebe,  
Duitscher, Cunningham,  
Schroeder, Koch, Graham,  
Nielsen, Kehe and Mohrfeld)

Passed Senate, Date...*2-9-70*..... Passed House, Date.....

Vote: Ayes...*33*... Nays...*24*..... Vote: Ayes.. .. Nays. ..

Approved.....

*Amended to read as follows  
Section 1, 26, 27-33*

## A BILL FOR

- 1 An Act relating to the installation of limited access diagonal
- 2 highways and highway placement.
- 3 *Be It Enacted by the General Assembly of the State of Iowa:*
- 4 Section 1. Chapter three hundred six (306), Code 1966, is
- 5 hereby amended by adding thereto the following:
- 6 "In areas of the state the secondary roads of which are laid
- 7 out in a grid system which is oriented on cardinal points, it
- 8 shall be illegal to install a limited access highway, or section
- 9 of a highway, which extends in a diagonal direction for a dis-
- 10 tance of more than five miles at an angle which is less than
- 11 forty-five degrees with reference to the direction of those
- 12 secondary roads of the area which extend in the same direction
- 13 as the overall general direction of the highway, except with
- 14 the approval of the general assembly by concurrent resolution.
- 15 In all rural agricultural areas of the state, when alternate
- 16 reasonably comparable highway routes are available, the one
- 17 shall be selected which will use the least valuable land from
- 18 an agricultural standpoint as determined by assessed valuations
- 19 existent five years prior to the date of the official announce-
- 20 ment of the related highway improvement program."

*Proof of  
Publication  
3/25*

1    Sec. 2. This Act being deemed of immediate importance shall  
2    take effect and be in force from and after its publication in the  
3    Belmond Independent, a newspaper published in Belmond, Iowa,  
4    and in The Sheffield Press, a newspaper published in Sheffield,  
5    Iowa."

#### EXPLANATION

Predictions are that well within the foreseeable future the population of the world will be expanded to the extent that production of an adequate supply of food and fiber will be a definite problem. According it is the responsibility of the present generation to conserve production facilities to the full extent possible. To this end it should be the policy of the State of Iowa to use the least farmland for nonfarm applications to the full extent that such is feasible and it should further be the policy of this state to limit installation of diagonal sections of highways in the rural, level-land areas of the state to instances where the gain in route shortening is very significant. The reason for the latter policy is that diagonal highways cut adjoining farm fields into triangular parcels which cannot be farmed efficiently due to the large number of point rows which are necessarily present. At less than a 45-degree angle, the gain of a diagonal is minimal. For example, suppose that a 10-mile east-west distance and a 20-mile north-south distance were involved, the latter extending north from the east end of the east-west segment. If no diagonal were used the total distance to travel would be 30 miles. If a diagonal of 45 degrees is used, the total travel distance would be roughly twenty-four miles including approximately 14 miles of diagonal road. If a diagonal were run from the west-most point to the north-most point, approximately 22.4 miles of road would result all diagonal. Thus, for roughly 8.4 more miles of diagonal, only approximately 1.6 miles would be saved.

#### FISCAL NOTE

Date prepared January 27, 1970

Requested by Senator Clarke.

Prepared in regard to Senate File 1098, a bill for an act relating to the installation of limited access diagonal highways and highway placement.

Following is the fiscal effect in dollars of the legislative proposal as required by Rule 31:

No estimate available.

GERRY D. RANKIN  
Legislative Fiscal Director

1 Amend Senate File 1098, page 1, by striking lines  
2 4 through 20 inclusive, and by inserting in lieu thereof  
3 the following new section:  
4 Section 1. Chapter three hundred six (306), Code  
5 1966, is hereby amended by adding thereto the following:  
6 "In areas of the state where the majority of  
7 highways are laid out on a grid system oriented on  
8 cardinal points, it shall be illegal to establish a  
9 limited access highway or section of highway, which  
10 extends in a diagonal direction for a distance of  
11 more than five miles at an angle or less than forty-  
12 five degrees with reference to the prevailing  
13 direction of the highway except with the approval  
14 of the general assembly by concurrent resolution  
15 or except where the highway is located parallel and  
16 adjacent to some previously existing physical feature  
17 which divides properties diagonally.  
18 In establishing the location of any highway, the  
19 highway authority shall consider the conservation of  
20 productive agricultural lands in evaluation of the  
21 location feasibility."

Filed and adopted  
February 9, 1970

By CLARKE

1 Amend the Clarke amendment to Senate File 1098, filed  
2 on February 9, 1970, and found on pages 404 and 405 of the  
3 Senate Journal, as follows:  
4 By striking lines 6 through 17 and by inserting in  
5 lieu thereof the following: "Before acquiring right-of-way  
6 to construct a limited access highway between two control  
7 points more than five miles apart, except when such proposed  
8 highway is located parallel and adjacent to some previously  
9 existing physical feature which divides properties diagonally  
10 or except with the approval of the general assembly by  
11 concurrent resolution, the highway authority is limited to  
12 the length of diagonal highway between said points to the  
13 shortest length of a semi-cardinal (45°) diagonal line drawn  
14 from one of them to a line drawn in a cardinal direction  
15 from the other; then those straight portions of said highway  
16 between said points which are not themselves in a cardinal  
17 direction shall not in total exceed said shortest length.  
18 In event of conflict in applying this rule, distant control  
19 points shall prevail over closer control points."

Filed and adopted  
February 26, 1970

By CLARKE