Ladies and Gentlemen, and Members of the Michigan Schoolmasters' Club:

It gives me great pleasure to come out here and address you because Michigan has the reputation of doing things, and I feel that I have come to a place where the conditions have only to be known in order to result in action.

In Michigan you raise apples as we do in my native state of Maine. Now there are good apples and bad apples. There are two kinds of bad apples. There are those that are hard and sour and bitter. There are those that have decayed.

I suppose it would not be possible to find in the whole state of Michigan any person so foolish as to attempt to make a hard, sour and bitter apple, sweet and soft and palatable by any process of training or exercise;—by keeping it warm or keeping it cold. It would be recognized at once that such an apple came from an ungrafted tree and nothing was to be done except to turn to the tree.

Equally absurd would it be to attempt to restore a rotten apple, by putting it among good apples, or by any process of treatment to bring it back to soundness.

It is curious that we are so much wiser in our ideas about apples than about children, and yet the same holds true of children. There are good children and bad children. Although the most of what we call bad children are not bad at all. But a great many of the so-called bad children are precisely like the hard, sour and bitter apple. They have grown on an ungrafted, uncultured tree, and it is just as useless to try to make them good, (I use the term "good" in the sense of moral,) as it is to try to make these apples good and palatable. Of the children that correspond to the apple that has become rotten, I have nothing to say at the present time, except to admit that there are children who have lived so long in a bad environment that they have really become so thoroughly bad throughout that reformation is practically impossible.

But it is of the other kind of child that I wish to speak and concerning whom I wish to tell you some things that we have found out from our studies.
In the first place I want to tell you what very few people realize that there is a relatively large group of children that are distinctly sub-normal by heredity or by early environment. We have them in our public schools. We have them in our classes. They do not keep up with their fellows, and they cannot. We have long known that they do not, but we have not realized that they could not. They are a type of child that excites our sympathy and pity, and we are constantly struggling with them, ever hopeful, ever looking forward to the time when they will take a start, and pick up and go along normally. We say, “if it were not for this or that or the other, they would be all right.” And so we will work with them and they will come out all right in the end.

Unfortunately for our education in regard to the group, this is occasionally true. It does happen sometimes that a boy that has appeared stupid to us suddenly blossoms out, and becomes even brilliant, but such cases do not affect the fact that there is a large group that are distinctly sub-normal. It is of this that I wish to speak.

At Vineyard, New Jersey, there is an Institution for the Feeble-minded, which some four years ago conceived that its highest mission in the world was to find out something about this group of feeble-minded children. Accordingly it opened a laboratory for psychological research. We have now been working at this problem for four years and have found out a few things of value. Among others, we have made a study of the growth curve of these children, and we find that defective children do not grow like normal children. The most defective are to be sure far below the normal, but I shall not speak of them, only of this highest group which is never recognized as being sub-normal by anybody but the experts. We find that this child stops growing from two to three years earlier than the normal child, thus showing that he is distinctly different in the amount of growth energy he possesses. Secondly, we have tested the will power of these children as manifested by their strength of grip. Here we find the highest grade of these children doing only from 15% to 20% as much as normal children of the same age.

But the point that I wish to dwell the most on is the one with which I began; namely, that the hard, sour and bitter apple grew on a bad tree; and these children that we speak of who are sub-normal in mental capacity, have come from sub-normal stock, and I wish to present you here a few charts showing graphically what our studies of the ancestry of these children has given us.

Squares represent males; circles females, the two superposed mean sex unknown. When striated they indicate some condition worthy of note in connection with the family history, e.g., with A added means the individual was alcoholic; T., tuberculous; S., syphilis; D., deaf; N., neurotic; Par., paralysis; Cr., criminal. With no letter = died in infancy.

Unlined circle or square with N. in it means Normal Person; without any letter means no data.
All black means Feeble-minded. Circle with black center means miscarriage; m. = married; d. = dead.

**Chart I.** The child represented on this chart is a very good illustration of the theme of this paper: namely, that a very high grade child often has a bad ancestry. This boy, now about twenty years old, has been very highly trained and is an excellent institution helper. He is a teacher in the school, and trains the younger and lower grade children with most excellent results. He would be entirely incapable of taking care of himself out in the world, and if he were turned out today, he certainly would land in the almshouse, or in jail.

![Chart I](image1)

**Chart II.**

As will be seen from the chart, he has a feeble-minded sister, and a feeble-minded brother. There were two other children that died as babies, while one sister is normal and has a normal daughter. The father was of good family but degenerate. The mother was feeble-minded and had three feeble-minded brothers, one sister that was tuberculous. This sister married a normal man and they had three children, one of whom died as a baby; the other two are feeble-minded. The grandfather was feeble-minded.

We have then twelve feeble-minded individuals in this family in four generations.

**Chart II.** This is also a relatively bright little boy, eleven years of age, the child of a prostitute and probably a feeble-minded man. This mother had a sister who was like herself, a prostitute, another sister that was
feeble-minded. There were two sets of twins, both of whom died in infancy, and four normal people. The normal members of this family have all had normal children. The parents of these, the grandparents of our boy, were on the grandfather’s side all normal; on the mother’s side we had a feeble-minded woman, who was married to a second husband that was feeble-minded. They had only one child, which died at birth. It weighed eighteen pounds. She also had an illegitimate daughter who married and had three children, one of whom died in infancy, one was feeble-minded, and the other unknown. Going back to the fourth generation, we find that the great grandmother was also a prostitute and feeble minded.

![Chart III](image)

CHART III.

Our child here is again one of those that would have appealed to the teacher as very hopeful, dull and backward to be sure, but most anyone would expect that he would come out all right. Yet look at his ancestry! There is no possibility of his ever becoming a normal child.

Chart III. Shows us two feeble-minded parents having five feeble-minded children. The paternal grandfather, however, seems to have been the one that transmitted the defect on the father’s side.

Chart IV. Is particularly interesting as showing the mental defect running thru four generations, and thru the mother’s family in three of these, altho there is defect on the male side also in the third generation.

The tuberculous maternal grandfather of our child had a feeble-minded sister; she married and had nine children of whom four were feeble-minded.
Chart V. Shows the maternal grandparents feeble-minded, and they have as always only feeble-minded offspring—two girls. One of these married a feeble-minded man whose brother was feeble-minded and a criminal, and a sister was disgracefully alcoholic. However, another normal brother married a normal woman and had six normal children. The offspring of the feeble-minded woman and this feeble-minded man were: three feeble-minded children and two others that died in infancy. An illegitimate son of the woman is feeble-minded and a criminal.

Chart VI. The feeble-minded paternal grandmother of our two children married an alcoholic and immoral man;—result, four feeble-minded children. One of these became alcoholic and syphilitic and married a feeble-minded woman. She was one of three imbecile children born of two imbecile parents. The result here could, of course, be nothing but defectives. There were two still-born, and three that died in infancy. Six others lived to be determined feeble-minded. One of these was a criminal. Two are in the institution at Vineland. The mother’s sister also has a feeble-minded son.

Chart VII. Perhaps adds nothing new for heredity, mainly emphasizing what we have already seen. However, for a social study, it is perhaps the best of anything we have yet found. Here we have a feeble-minded woman who has had three husbands, (including one “who was not her husband,”) and the result has been nothing but feeble-minded children. The story may be told as follows:

This woman was a handsome girl, apparently having inherited some
refinement from her mother, altho her father was a feeble-minded, alcoholic brute. Somewhere about the age of seventeen or eighteen she went out to do housework in a family in one of the prominent towns of this state. She soon became the mother of an illegitimate child. It was born in an almshouse to which she had fled after she had been discharged from the home where she had been at work. After this, charitably disposed people tried to do what they could for her, gave her a home for herself and her child in return for the work which she could do. However, their confidence and help was misplaced,—she soon appeared in the same condition. An effort was then made to discover the father of this second child, and when he was found to be a drunken, feeble-minded, epileptic in the neighborhood, it was thought that they should be married. The good friends saw to it that the ceremony took place. Later another feeble-minded child was born to them. Then the whole family secured a home with an unmarried farmer in the neighborhood. They lived there together until another child was forthcoming which the husband refused to own. When finally the farmer acknowledged that it was his child, the same good friends interfered, went into the courts and procured a divorce from the husband, and married the woman to the prospective father of the fourth feeble-minded child. They have since had four other feeble-minded children, making eight in all. There has also been one child still-born, and one miscarriage.

As will be seen from the chart, this woman had four feeble-minded brothers and sisters. These are all married and have children, but we know nothing of any except two of them. One of these is feeble-minded and the other died in infancy. The mother had three other sisters that died in infancy.

Chart VII. Is in some ways the most astonishing one we have. There are in the Institution at Vineland five children representing, as we had always supposed, three entirely independent families. We discovered, however, that they all belonged to one stock. In Chart VIII. the central figure, the alcoholic father of two of the children in the institution, married for his third wife a woman who was a prostitute and a keeper of a house of illfame, herself feeble-minded and with five feeble-minded brothers and sisters.

This woman had had three illegitimate children, which, however, are
generally referred to this man. After their marriage, they had three other children, all of whom are feeble-minded. Two of these are in this institution.

A sister of this woman married a feeble-minded man, and the result of that union was six feeble-minded children, one is a criminal, and one an epileptic; three are married. This feeble-minded epileptic woman married a man who is one of a fairly good family. As the result, however, of this marriage, we have six feeble-minded children, four others that died in infancy and there were two miscarriages.

These are a few samples out of many histories that we have on file in our laboratory, and let me remind you that I am giving you no exceptionally bad picture. This is the condition of things that exists all about us. We have these mentally defective children in every community. They are of such a high grade that they are not usually recognized. They are out in the world struggling to make a living, but failing, eventually become paupers, or criminals, or dependents upon their relatives or friends, in any case very probably marrying and reproducing their kind at an alarming rate. Statistics show that this group of people is increasing at double the rate of the general population. These children comprise from one to two percent of the children in our schools. They cannot learn to read and write and count, with

any efficiency, and yet we are wasting their time trying to teach them these things. The thing that they can do is to learn to use their hands. Manual training, physical culture, and the like are excellent for them, and make them happier and make them as useful as they can become. They often have excellent memories and learn so much by rote that we are deceived into believing that they are making progress.

The problem before the school authorities of the country today is the segregation of these children, the selecting out from the regular classes and putting them together in special classes under specially trained and expert teachers where they shall be trained to do whatever their capacity permits, but shall not be worried with those abstract subjects of reading and writing which they can never do. In this way we shall relieve the regular system
and we shall do more good for these children than in any other way. Cease worrying them with books; teach them to work and thus make them happy. But however efficient we make them as workers with their hands, we must never forget that if they marry they reproduce their kind, and again fill our schools with defective children with whom the same process will have to be gone thru.

The only thing for society to do is to prevent procreation in this group, and then in a generation the problem will be greatly reduced and simplified.

It is a comparatively simple matter to establish these special classes, and once let the parents of the normal children realize how much their children are benefited by having these defectives removed, and we shall have the complete support of the entire community. If any complain that it adds to the expense of the public school system, it is easy to show that it is cheaper to take care of these people in the public school than in almshouses and jails. It is better to train them to do something useful than it is to have them grow up in ignorance and become paupers and criminals. They now make up from 12% to 30% of our criminals, a large percent of our paupers and a still larger percentage of prostitutes.

I am glad to know that Michigan already has some special classes and that more are being contemplated, and I hope that it will not be long until you have one of the best systems of special classes in the country.