Slightly less than 200 years ago there existed on the American continent 13 separate and sovereign countries. These countries differed substantially in customs, religion, and economic institutions. Except for one factor, the United States of America today might well be the States of America, still existing in wholly individual sovereignty. The factor which played the most important part in the unification of the States under a federal republican system of government was the need for a common defense.

Just as the necessity for the strongest defense was a primary consideration in the thoughts of our forefathers, it has remained and is today one of the basic concerns of the people of the 50 United States of America.

The United States of America is a young country. In the records of the thousands of years through which the civilization of man has progressed, our Nation has found a place in history for a period of less than 200 years. From a standpoint of rate of progress, however, we stand second to no nation in all of history. Unlike many of the early world powers, we have reached the crossroads of destiny in a short time, and find ourselves now confronted with a position of world leadership and, as such, responsible to a degree unknown to any other nation for the survival of mankind.

The Second World War was the culmination of our rise to the top as a world power and required our acceptance of the role of world leadership which we had previously been reluctant to undertake. While we are inclined to pride ourselves on the glory of our position as the leader of free peoples, our acceptance of our responsibility as principal defender of liberty for the world since World War II fails to demonstrate an unexcelled ability on our part to exercise this responsibility in the field of defense.

In 1945 and '46, we followed our unbroken historical post-war practice of rapid demobilization of our Armed Forces. Thus we began our out-in-the-open struggle with the forces of Communism from a position of weakness. By 1947, we were beginning to realize the error of our ways, and a rather slow, almost half-hearted, build-up of conventional forces was commenced. The creation of the Department of Defense and the reorganization of the Armed Forces were the most notable advances of this rebuilding effort.

In 1948, communist capabilities had been underrated to the extent that we reversed our course and again began over-economizing our defense. These defense cut-backs continued until we were rudely shocked into an almost awakened state by the outbreak of the Korean conflict in 1950. It was here that we became initiated into the concept of "limited war". Even during this period
of armed conflict, we limited our efforts largely to those required by that con­
flict itself.

Only after the end of the Korean War did we seriously concern ourselves
with what we then thought of as weapons of the future—missiles.

We approached the development of missiles with a measured pace, comfortable
in the imagined safety of our superiority in nuclear devices and the potency of
our Strategic Air Command Forces. It was not until the fall of 1957 that we
came face to face with the hard facts of life—that Russian Communists were a
foe worthy of our best efforts. It took Sputnik to bring us to a realization
of our peril, if indeed we have yet truly faced that reality.

Our errors in the decade following World War II are easy to detect from
the vantage point of hindsight. In view of the history of the American people,
our commission of errors should not be surprising to us. We are truly a
peace-loving peoples, most reluctant to concern ourselves with war until we
are backed to the wall. Our strength, and even our survival, has traditionally
resided in our ability to unify and concentrate our efforts in extreme emergency.

We must first face reality with respect to our national defense responsi­
bility. First, the large defense effort which is essential to our survival
will not decrease in the foreseeable future. Indeed, it is quite probable that
an even more expensive undertaking lies ahead of us. The cost of liberty has
never been cheap, and we shall be indeed fortunate if in the years ahead we
can preserve it with a diversion of our resources rather than additional
sacrifice of lives. Now is the time for a resolve by all people of our country
to sacrifice whatever is necessary of our material wealth cheerfully and willingly
in order to preserve the infinitely greater wealth of freedom.

At every mention of defense we, as Americans, in this day of rapid
developments in technology are particularly inclined to think in terms of
hardware and numbers of uniformed men. Unquestionably, both trained men in
sufficient numbers and the best equipment possible are essential to any
adequate defense effort. We should ever keep in mind that the basic strength
of any people, regardless of the size of their armed forces or the modernization
of its equipment, lies in the moral fiber of its citizens. A demoralized
people, whatever their outward vestiges of defense, can never know the joys
of success or the fruits of victory. The most basic and essential ingredient of
a successful national defense must lie in the will and determination of the
people themselves to protect their liberty regardless of the sacrifice. This
will and determination to fight when necessary can only be stimulated by a
deep and abiding love of liberty and a realization of the constant threats to
its existence.
Since this basic ingredient of our national defense—the will to fight—must stem from the people, it is the people themselves who bear the responsibility as well as the cost of our national defense effort. It is, therefore, the right—and even more, the duty—of the American people to insist on two things: first, that our defense is secure; and second, that our defense dollars are being spent wisely.

Our task will not be an easy one. Lest anyone still be deceived concerning the challenge which faces us, consider the assets of our potential antagonist. He has:

First, nuclear and thermonuclear weapons, and chemical and biological weapons, and means to deliver these to targets almost any place on the globe;

Second, a gigantic ground force equipped with highly modern weapons;

Third, control over a ring of satellite countries responsive to his will;

Fourth, a highly developed apparatus for conducting subversive activities in countries which he does not dominate; and

Fifth, an appealing ideology which, however false and hollow it is, has an attraction for many of the underprivileged people of the world.

Our present defense policy is framed around the maintenance of a deterrent force with sufficient capability to make it obviously unwise for any aggressor nation to chance its unleashing. Today, and possibly for some time yet to come, insofar as an all-out nuclear war is concerned, we have such a deterrent force. It is comprised principally of the Strategic Air Force and its long-range nuclear capabilities. Supplementing the Strategic Air Force are intermediate range ballistic missiles ringing our potential enemy at widely dispersed sites, and carrier-based aircraft with nuclear capabilities. There can be little question that the Atlas inter-continental ballistic missile will soon be available in sufficient operational numbers to complement and eventually replace, with its successor ICBM's, the Strategic Air Command.

As long as our potential enemies must rely principally on ICBM's for offensive efforts, our retaliatory capabilities should be sufficient as a deterrent force to prevent all-out war.

Grave danger now lies in our self-satisfaction at the fact that our present retaliatory forces are a sufficient deterrent, despite our failure to decrease the Soviet's scientific lead demonstrated by Sputnik, and reproven by the recent Russian Lunar probe. I fear we are once again in danger of planning our retaliatory defense forces around weapons of today. The inter-continental ballistic missile, with its nuclear war-head, is no more an ultimate weapon
than was the Maginot Line or the Atom bomb dropped on Hiroshima. There has never been an ultimate weapon, nor is there any sound reason to believe there ever will be one.

Let us be more specific. If one nation now develops a space platform relatively impregnable to attack by its enemies' present state of weapon development, the stalemate is broken. An attack could not be stopped by any amount of retaliation on the aggressor's homeland. This is where the lead in scientific development, now obviously enjoyed by the Soviet Union in the field of thrust and rocketry, must be overcome. It is no answer to rely on our presently sufficient retaliatory force. A bare minimum may suffice for the present, but at some future state, it will prove woefully inadequate.

This brings us to another matter of vital concern, and that is the emphasis that is distributed between basic research, on the one hand, and applied research or technology, on the other. History will undoubtedly record the efforts of the people of the United States during the first 200 years of our history as unexcelled in the field of technology. I speak of technology in this context as developmental or goal-oriented research, as contrasted to basic or fundamental research, which is the accumulation of knowledge for the sake of knowledge, or the satisfaction of curiosity. In the latter field we are in danger of being judged by historians as woefully inadequate.

The development of the Atom bomb amply illustrates our superiority in technology and our weakness in fundamental research. The great stream of scientific discoveries prerequisite to production of a nuclear chain reaction was attributable almost exclusively to great European scientists such as Becquerel, who discovered the phenomenon of radioactivity; de Broglie, the founder of wave mechanics; and Einstein, the German who evolved the mass-energy relationships. Indeed it was two Germans, Leise Meitner and Otto Hahn who succeeded in splitting an atom of uranium, thus producing the first nuclear fission.

It was to this pure research that the Americans--the world's greatest builders--applied their technological know-how to achieve the first practical nuclear weapon.

The time has now come for Americans to distribute their energies more evenly between basic research and the applied sciences. With the forces of Communism controlling such a major proportion of the world's people, the interchange of ideas in the field of fundamental research has been greatly restricted. We must in the future rely to a much greater extent, on our own ingenuity for the discoveries that result from fundamental research to which we can apply our unsurpassed technological capabilities.
It would be foolish to expect the fruits of our efforts in the field of pure research to be apparent immediately. Indeed our effort must begin with the stimulation of the minds of our younger children in the full knowledge that many years will elapse before their minds are trained and developed to the stage that they are qualified to independently seek the satisfaction of their curiosities with respect to the mysteries of the universe. The short-sighted approach, however, of concentrating exclusively on immediate defense needs would surely pre-doom the liberty of our grandchildren. At the present time the United States is engaged in the most extensive and concentrated research effort in our history. Unfortunately, however, only about 10 per cent of our scientific effort is directed at pure research. A re-examination of the distribution and size of our effort is certainly in order. We must no longer discount programs simply because they do not promise immediate results and solutions to our current difficulty.

There are those who are of the honest opinion that if we achieve a lead in missiles and their successor weapons of the future, our defense problems are solved. Not only do they picture "massive retaliation" as a deterrent to all-out war, but also as a deterrent to limited wars, such as that in Korea and Indo-China. I do not believe that such an opinion is sound.

One of the basic ingredients in any effective deterrent is the enemy's conviction that our power will be unleashed should be take the action we would deter.

Now the Communists are quite aware that should they commence a nuclear exchange, every destructive weapon at our command would be unleashed against them. Quite frankly, we would have no alternative, and the Communist leaders know this as well as we do.

But what about a localized aggression against a small country with satellite troops? Is the Communist leader convinced that we would commence an all-out nuclear exchange to prevent it? I seriously doubt we as a people have convinced ourselves that we would go so far. We had nuclear retaliatory weapons at the time of the Korean War, and at the time of the Indo-Chinese War, but we refrained from using them. We decided it the wiser course to limit the conflict. Why should the enemy conclude that we would react differently in the future? For that matter, why should we assume that we would react differently now? We as a people have no less distaste for a nuclear exchange than we had earlier.

Our "massive retaliation" power is an effective deterrent to all-out war, but not to limited wars. We must have an additional deterrent if we would prevent them.
The need for the ability to wage a so-called limited war or a war of less than all-out proportion has been repeatedly demonstrated. We must not close our eyes to the probabilities that they will recur. The directors of the Communist strategy know full well that the risks involved in an isolated or limited aggression are far less than in a nuclear exchange. At the same time we should have no doubts left that the Communist program, if it is to escape death from inertia, must attempt continued advancement. In light of these two factors, anyone who denies the probability of more limited wars in the future is out of touch with reality.

Early reports of the administration's proposed budget for fiscal 1960 lend some hope that the administration recognizes the need for forces to cope with wars of a limited nature by proposing no additional cuts in Army strength. Not only would it be a fallacy to further reduce our potential in this field, but it would be the far wiser course to commence immediately a strengthening of these forces and a stepped-up program of modernization of equipment. Our present conventional forces are not sufficient in numbers, equipment or transport to constitute a sufficient deterrent to limited wars. This weakness must be recognized and corrected before it is too late.

It is imperative that our armed might be of such strength as to deter the enemy, if at all possible, not only from precipitating an all-out nuclear exchange, but also from engaging in any other type of aggression to advance his ideology; and in the event the potential antagonist forsakes the resort to reason to which any deterrent is addressed, our defense must be adequate to bring decisive defeat to the enemy's effort whatever be its scope.

The build-up of armed might must be accomplished with a steadfast knowledge that we must at the same time conserve our economic strength. The cause of Communism could realize victory over liberty just as completely if we suffered an economic collapse as in the event of our military collapse. Property and people are destroyed as effectively through the medium of inflation as they are with bullets, and the knife of inflation has the advantage of silence and stealth. In preparing to combat the Communist menace, therefore, economic strength must be placed on an equality with military strength.

There is no room at this stage for pessimism despite the breadth of our challenge. We are a young and vigorous nation, rich with potentialities and resources with which to guard our freedom. We have the most worthy cause in the history of mankind for which to fight—LIBERTY. Make no mistake, liberty must be fought for to be acquired or retained; for, like a jealous woman, liberty won't stay where it is taken for granted.
The people of the United States must demand a defense that is secure; secure not only from a nuclear exchange, but from any aggression, regardless of its nature or scope. The demand must be made with an awareness that the dollar cost is high, and will probably go higher; and that in order to preserve economic strength at the same time, services that result from non-defense government spending will have to be limited and possibly curtailed.

Due to the form of government inaugurated by our forefathers with the Constitution, the people of the United States have, during the entirety of the history of our nation, held the power of their liberty and destiny in their own hands. Since our ascension to leadership in the struggle of freedom against Communism, the people of the United States have come to hold the key to the liberty and destiny of all the peoples of the world. Let us accept this awesome responsibility, and discharge it in keeping with the heritage as champions of liberty that is ours.