

"This Is A Promised Land"

from a physical scientists standpoint

I see material prosperity as coming from science

NOTES  
IDEAS

Feb 8  
talk  
1976

- 1. HT Hall
  - 2. Bob Layton
- B. of M.

Most important  
atoms/molecules you can depend on  
Moses. Everything created spiritually first  
Food "total sacrifice" for us

God you can depend on

- Temper the elements
- 3. Vision of Nephi - Recital by choir
- 4. Comments by Clint Larson -
- 5. Greg Larson

Chem reactions.  
making polymers  
" steel  
" diamond

Sci arranges conditions  
atoms do the rest  
They "obey" - rearrange

[grow, reproduce, have motion] growth → Crystallization - order

rock seems static  
200 x 10<sup>9</sup> magnifying glass  
atoms perpetually moving

If Motion is life  
atoms are "alive"  
However do not reproduce themselves

Scientific Advances since Jos. Smith 1830

Physical Comforts Std of living - highest world has known  
Sci freedom, free enterprise (business) <sup>not because of</sup> "management" - but in spite of it.  
unleashed the creative powers of its citizens

High Proportion of scientists (LDS) - 40 yr supremacy  
Educational Encouragement (LDS)

miracles - Jesus stilling the storm -

higher law seems to refute law known to man

↳ power given to disciples  
Mary Fielding - Blessing on ox & Wagon

Faith needed by Scientist

Science usefulness to Church - <sup>Engg & Technology</sup> T.V., Radio etc - missionary

Computers, airplanes - Telephone, telegraphs  
medicine - movies, slides, hi spd. printing

Building  
Halls  
Chapels  
Temples

Personal experiences of Interest

Dependable - expand a gas - cooling occurs - 100 x 10<sup>6</sup> refrigerators exist.

Man the organizer - God the organizer -

Make polyethylene - McCartney equipment -

" Nylon -

Generate electricity - aerodynamic laws -

Thos. Jefferson

Christian: separ church + state - no public support of religion  
USA first country for

Unitarian ← some say he would be today.

Prot. L.D.S. ← Temple work vicariously performed for him at his request.

Humble <sup>simplicity</sup> - eschewed pomp + ceremony of govt.  
plain <sup>clothes</sup> did not make many speeches.  
Retiring, scholarly work behind scenes.

Know no social distinctions. <sup>In company</sup> He chose by preference honesty,  
& knowledge as only tests of distinction.

#  
"one generation should not and cannot bind  
another by paper documents"

Physical 6'-2", large boned, thin, angular features,  
ruddy complexion, sandy hair, grey eyes. Sweet tempered

Pres. Am. Phil Soc. for many years.

Died July 4, 1826, the 50<sup>th</sup> anniversary of the Decl. of Independ.

epitaph "Here was buried T. J., author of the Decl. of Independence,  
of the statute of Virginia for religious freedom, and  
father of the U. of Va."

Jefferson Memorial, Wash D.C. -

- Godless  
- ungodly

Shall we choose the pattern of the U.N.  
or the Godfearing pattern of the founders of  
our Country + Let us be captains of  
our soul but have God as <sup>the</sup> navigator.

Woman's objection to astronaut's mention  
of God & reading bible at Xmas.

Worthington's Soybean meat  
Arthur Godfrey's Eggless Egg

#2 Hall

2 Jan 1976

Instructor article      miracles of Jesus

I don't know that being a Physical Scientist gives any unique or special vantage point to address the subject "This Is a Promised Land. Perhaps it ~~is~~ has appeal to know that one who deals with so called exact sciences is a believer in Blessings, miracles, and spiritual things which to many have no ken with science. How does he reconcile the paradox?

"Landing on Moon" . Left 10<sup>th</sup> Sth Drshp. early to see on Jounson's T.V. Saw article in newspaper (in Wainott) Sunday supplement. Predicted landing by abt. 1955 - Round ship with lots of protruding, stubby canons on its surface. Rocket blasts were to come out of these.

Freedom & liberty To unleash the creative American mind, energy, resourcefulness etc.      Jefferson

Generalist

Drafted the Decl. of Independence.  
Scholar / Doctor / architect. Education, medicine, Geography, History, astronomy, Mathematics.  
Thomas Jefferson: Knowledge of Latin, Greek, French, Spanish, & Italian. Higher Math. throughout his life made practical use of the calculus. Natural Science, he corresponded with the Giants of his age. Writer, philosopher, Literary.  
Expert violinist, a good singer and a good dancer. Proficient in outdoor sports, & excellent horseman. From his social environment he took only the good (Gambling was the rage in his at Williamsburg) He never gambled, used tobacco, never played cards. A gifted writer. A Lawyer admitted to the bar (He detested lawyers "whose trade it is to question everything, yield nothing, and talk by the hour).  
Scholarship and industry Experimented with grasses, trees, rice, olives & seeds of every kind. Discovered the exact formula of mould-boards of least resistance for ploughs. Remarkably apt in practical application of mechanical principles.

(5)

I have emphasized invention as creative endeavor because I ~~am~~ <sup>of my</sup> ~~very~~ <sup>acquaintance</sup> ~~with~~ <sup>with</sup> it. ~~However,~~ <sup>nevertheless</sup> I ~~hasten to say that~~ creative endeavor in all ~~any~~ fields has been a special blessing to Americans. No other land has seen its equal.

Invention and <sup>other</sup> creative endeavor in general can be to mankind's blessing or to his destruction. ~~This depends on man himself.~~ Having been so favored of the Lord ~~Lord~~ in these matters, it will only be for our blessing if we ~~acknowledge his hand in all things.~~ Gratitude, thankfulness, humbleness, ~~righteousness~~ when he knocks, asking for admittance to our house use them according to His Will. ~~him as did the founding fathers.~~

When he knocks asking for admittance to our house, what will the ~~answer~~ be? our answer?

In God We Trust

I Christ knock at U.N. / only lusty + society shape  
greedy <sup>gastrotis</sup> ungrateful beggars rant

tin-pan generalissimo-dictators spit + shout

II overweening concept " I am the sole captain of my soul.  
independence, confidence, reliance fine

Temper by knowledge God exists

He has a plan for this world

III our country figures in that plan the prophets say  
particularly regarding constitution + its founders

IV Consider Thos. Jefferson

such a man rarely born

knew math, mechanics, lit, geol, bot, paleontology,  
architect, geog, zoo, medicine, surgery,  
aeronautics, agriculture

knew Latin, Greek, French, Spanish, + Italian

as youth learned Gaelic / translate Ossian (3<sup>rd</sup> cent Irish hero)

played excellent violin, sang well, good dancer

statesman, philosopher (Pres Am. Phil Soc)

author Decl. Independ. 40 yrs public service

did not smoke or gamble mind +  tongue pure

V In contrast to the U.N., U.S. founding fathers acknowledged  
existence + power of God.

Washington's 1<sup>st</sup> Inaug. address (April 30, 1789)

"It would be peculiarly improper to omit in this  
first official act my fervent supplications to that almighty  
being who rules over the universe, who presides in the  
councils of nations and whose providential aids can  
supply every human defect..."

The last line of the Declaration of Independence reads,  
" And for the support of this Declaration, with a firm  
reliance on the protection of divine providence, we  
mutually pledge to each other our Lives, our Fortunes  
and our sacred Honor. "

In 1774 Jefferson wrote: "The God who gave us  
life, gave us liberty at the same time..."

Jefferson's vision of liberty encompassed a limited government that provided the maximum possible freedom for its people in order to unleash their creative ability. Let me repeat: provide maximum freedom in order to unleash the creative ability of the people.

#### VI First Moon Landing July 20, 1969

Neil Armstrong "The 'Eagle' has landed"

6½ hrs later "That's one small step for a man,  
one giant leap for mankind"

Excused myself from stake meet / View on Jonsson's T.V.

#### VII moon landing symbol of Jefferson's Idea "unleashed creative ability"

Started slowly, gained momentum, now an unnoticed flood  
Polyethylene, penicillin, Boeing 747's, Hewlett-Packard  
pocket computers, 150 bushel per acre corn, 5 gallon  
cans, 20¢ coast to coast phone calls,  
central heating, air conditioning, and much more.

#### VIII Creative Endeavor / Constitution

Article 1, Sect 8, Clause 8 "The Congress shall have the power... to promote the progress of science and useful arts by securing for limited times to authors and inventors the exclusive rights to their respective writings and discoveries." Patent laws 1790.

Today: 1 patent / 10 min issues

Now over 3,000,000 patents (U.S.)

#### VIII Greatest Patented American Inventions (1940) 18 chosen

Eli Whitney's Cotton Gin (1794) earliest choice

Wm. Burton Oil Cracking (1913) latest "

In between: McCormick's reaper (1834)

C. L. Sholes typewriter (1868)

Edison's phonograph (1880)

Chas. N. Hall's aluminum (1889)

Baekeland's Bakelite (1909)

IX Jefferson would be pleased at all this  
He was remarkably apt in application of mech. princ.  
discovered exact formula for mold boards least resistance

Emphasized invention