

Welcome to lecture number 12.

So if you're counting, you may know that there are 18 total lectures in the course, this being 12.

When we get finished today, we will be two-thirds of the way finished.

I mean I hope you're not counting the days, or in this case counting the lectures, til it's over, but ah that's what we have. And today we end with the early modern period.

We've spent a lot of time here, but if you're really interested in the emergence of modern environmental ideas, then the early modern period is you know one of the best places to look to see that.

So we're going to be continuing with our

friend Milton, and then
going through some other people
like George Herbert, who also are
important if in
small ways. So you'll see what I mean, but
why don't we just jump right in
to look at the actual lecture itself. So
here's our prezi of course,
and wow we've come so far. We're way up
here,
near the top with number 12.
Let me just click in here. This is
going to be
Milton again, and Andrew Marvel, a friend
of Milton,
and George Herbert, and the end of the
Renaissance for sure,
and the end of the early modern period
as well.

So this is a
work that was done in 1825 by John
Martin
of "Paradise Lost." Paradise Lost would be
illustrated
quite a bit. And I draw attention to the
fact, aside from
the actual thing that happened here, Adam
and Eve being visited by an angel,
just you know how much attention is
being paid to the landscape here.
So we're going to talk about local
descriptive poetry one last time in
terms of the early modern period,
and you can really see the parallel
here, which what an incredible description
is being given to the scene.
And given that, arguably, you know
certainly an argument that was

forcefully made by Lynn White Jr,
that this particular scene, this
particular part of the
Hebrew Testament of the Bible, is just
very indicative of a
local- of an anthropocentric stance.

Well you know here you really see the
opposite.

Yes, it's centered on human action, I mean
they're sort of in the foreground here,
you're not going to lose the human
action,

but an enormous attention is now being
paid to the environment by the artist.

And let's look how this plays out with
local description and Milton.

So Paradise Lost again.

Paradise Lost is like Cooper's Hill,
highly descriptive

of a locale. I won't read this, one of the advantages of having these as slides is that- or a video rather that you can go ahead and read it yourself. But what this is is a description of Eden, and Milton is providing a lot of attention, a lot of detail to let you know what Eden is like. So he's certainly in the local descriptive tradition. And by the way, you know we're not that far away from Cooper's Hill, the work that really puts this emphasis on a local description. It's the case that Cooper's Hill was first published in the 1640s before the

civil war,

and then as I mentioned, new versions of

it appear in the 1650s.

But then the first version of “Paradise

Lost” appears the next decade, in the

1660s, to give you a sense of the

chronology.

But we're certainly in the local

descriptive

tradition now. And why?

Well you know you think about a Paradise

Lost must be highly descriptive

of a locale. And why? Because you know

you just can't visit Eden. It's an

excellent example of the power of local

descriptive literature as it's

wonderfully able to represent an

environment

that you know you can't gesture to

as it does not exist. I'm not making a religious statement there, I mean if you believe Eden existed that's fine, but it doesn't exist now, and Milton didn't have access to it, Milton couldn't go visit it.

Milton certainly can't gesture to you know you to Eden, he's not like you know with Ben Jonson's Penshurst where he can sort of walk through the estate metaphorically the way Jonson did saying:

look at that bird there, look at that partridge there, look at this, look at that. You can't do that. The only thing he has available then, because this landscape no one has ever seen, is description. So you-

Everything there, and furthermore

because

the things he's describing you know

are from

another time. So it's not even like he

can reference like a local plant or

something,

he doesn't have any of that available,

it's all about description.

So even though local descriptive, the

emphasis on it has just sort of emerged

with Denham a decade or two before,

with Milton you really see the- you know

him realizing the importance of the

project to be able to do this.

And in a way, if you compare

Paradise Lost to pretty much any major

work of literature that comes before it

in the English tradition in any event, it

is so much more lush with the

description for this

reason. Milton fully realizes, I

guess a way of putting it, the import and
significance of it.

He also, in Paradise Lost, Milton you know

he's describing a local that no one has
ever visited,

which is Eden. And no one's ever visited

Heaven or Hell

also, so he describes them in great
detail.

And as kind of an aside, but something

worth thinking about,

because Milton was a modest you know he

imagines Heaven and Hell is made of the

same

basic matter as everything else

in you know on earth and in the

universe

otherwise. So they are strikingly similar
in appearance these three places in
Milton's descriptions.

But what I mean by that is, you know Hell
has a very
you know grim place, not a place you want
to visit, but
it still has mountains, it has streams, it
has plants there,
so does Heaven in Milton's description.

So
it's important that these features
are all there for Milton
because as a modest you know it would be
odd to say that, or
potentially odd, to say that everything
is made in the same manner, but Heaven is
so fundamentally different. Well no, it's
alive and bursting with life just

like things are

here with plants, and mountains and

things like that too.

But then Milton's description, and it's a

significant one, is to try to

describe these places, or to you know

imagine them very differently even

though they

are in a sense very similar.

Yeah, and here's a remarkable statement

made by

Milton. That earth and Heaven, and

this really- this

underscores the significance of Milton

as a modest, and almost taking

monism in this sense to his logical

conclusion.

That Heaven and Hell- Heaven and earth

are so similar that they could have one

day

merged. So what I mean by that is, and

Milton's thinking if there hadn't been a

fall,

okay hypothetically. And presumably

in this-

where this religion unfolds, that was

important that that

was a possibility there, human beings had

free will, they didn't have to do what

they did Adam and Eve, but they did, but

if they hadn't,

that was a possibility, a real

possibility according to Milton.

They would have brought about an

extraordinary event,

this is the line from Paradise Lost. "And

Earth be chang'd to Heav'n,

and Heav'n to Earth." So the idea here

is that Heaven and earth are so similar
that human beings would have actually
brought about an amazing cosmic event,
which
is the merging of Heaven and earth
together.

So if you're a dualistic thinker, and you
think that earth
and Heaven are so fundamentally
different, one earth a physical realm,
Heaven a metaphysical realm, who knows if
it's even made of the same
kind of stuff and all. Milton, one,
wants to say they are made of the same
stuff, but two they actually would have
merged
together, they would have become one.
That's an extraordinary statement
regarding our relationship to the earth,

to the planet,
because it suggests that you know this
place
here had the potential to be Heaven
itself.

That's a remarkable statement in
Christian thinking.

And you can see where you know now
that this sort of
the ball got rolling with Emilia Lanyer
in Christian stewardship,
people are beginning to make rather
extraordinary
you know comments and thoughts, and
Milton is one of them, that you know
the earth is really amazing and
that it you know it could have been
Heaven.

That's an amazing thought. The other

thing that's important, and I'm
kind of a little spoiler here, but I'll
note it at this point.

The other big innovation that will
happen in this period, and it's been
argued, and I guess by me,
that Milton is one of the first people-
is kind of the first person in the
English tradition, in the West maybe, to
do this
in a big way. And that is that,
after God creates everything in Genesis
right, well what does he do
then? Where does he go then? Well most
people thought that he was
separate and apart from the earth, that
the earth wasn't quite his realm
anymore, he was up in Heaven. And what I
mean by that

is, the earth then becomes the realm of Satan. Satan is alive and well on planet earth, and he's running around causing all sort of mischief. But God wasn't really here, God is allowing Satan to do that, he's more powerful than Satan for sure, but you know this is for Satan to sort of test human beings, human beings are being tested while they're here in a manner of speaking. And if they succeed at the test they get to be with God in Heaven for eternity. But God's not here on the earth, the earth is so apart from his realm, Heaven. But Milton suggests, and people after him will really pick up this ball and run with it,

that God is not a transcendent God, this
Christian God. In other words, he's not
you know in a metaphysical way
transcending this one, but he's an
eminent God,
that he's actually here in nature. And
Milton,
we just said sort of plays into that. And
what I mean is,
in this thinking, if God is eminent in
nature, when you look at a beautiful
mountain
or a beautiful river or a beautiful
sunset,
you are actually seeing God who's still
here,
eminent in nature. And you know you're
maybe even- further you're
you know in

something of extraordinary beauty like that, you're actually looking at the face of God itself.

Well you know to Milton that of course makes sense, if you know if a mountain could have been a mountain in Heaven, why wouldn't it be wonderful and you know.

This also has profound implications for Christian stewardship because it means that you surely want to take care of mountains, and streams, and everything because God is here, you're actually tending to God himself, not just his creation. But if he is here, actually you know in the stuff here- Again, it wouldn't be that way if he were a transcendent God, he'd be up in

Heaven, he had nothing to do with this realm, it'd be you know the playground of evil. But if he's actually here, it's all the more reason that you want to be a good steward.

All this matters of course. And you know if you're not in the Christian tradition, not raised in it, you know you don't think of yourself as a Christian, you might think boy this course just deals a lot with Christianity.

Well yeah it does because Christianity has been you know the sanctioned religion for the largest history of this western culture.

It is kind of playing out, you know we

saw with

the Epic of- I'm sorry, with the

Dream of the Rood. But by the time we get
to Chaucer, and that's you know 600 years

ago,

this is a firmly totally Christian

culture, it's

been a firmly Christian culture. The

history of the West for the last

thousand years has been a Christian

history.

So how Christians think, and changes in

Christian thinking, we're seeing some

profound ones here in this era,

and with Milton maybe more than anyone

else. This is really important, so

we kind of have to attend to this.

Did you enjoy Paradise Lost? I argued

it's perhaps the greatest long poem in a

Christian-

greatest long poem in the English

language.

A couple contenders might be Walt

Whitman's

you know Leaves of Grass, another big

favorite of mine.

But I hope you liked it because you

know it is an important poem.

Okay. Moving away from Milton.

Andrew Marvel, 1652. Marvel has an

interesting

connection to Milton and history,

and that is kind of an aside, Milton

would have been

killed by the king had it not been for

Marvel.

So I mentioned, when we did Cooper's Hill,

that there was a

civil war in England in the 1640s that ended with the beheading of the king.

Milton was a pretty major player in that band of revolutionaries, he helped generate the rhetoric that made it possible.

Milton actually writes, for example, a tract like a

thesis- a treatise on whether or not you know it's okay. By the way that was my

chicken in the background, you might have heard here my little building where I am is pretty close to the chicken.

This is a chicken and not a rooster, but since she is sure that she is the absolute uncontested

ruler of this place as far as
chickens are concerned,
she has taken on the role of being a
rooster and
doing that crowing in the morning.

Normally that's something that only
roosters do.

But sometimes when they're- you get
enough

female chickens together, one of them
takes on the role of being rooster, and
that one's name is

Hermione, and that's what she's doing.

Okay

sorry for that interruption, I think I
can stop now because I think she stopped.

But Milton is part of this band of
revolutionaries, and he actually writes a
tract on why it's okay to kill a king,

that under certain circumstances
it's okay to do that. He writes others
too, but that's kind of one of the most
outlandish.

It's all fine during the 1650s when
the king has been killed and the you
know parliamentary opposing forces are
in power.

But in 1660 the monarchy is restored,
the king's son who's Charles II, Charles
the first being the one who was killed,
comes to power. And he begins rounding up
all the people that you know did this to
his father,
and he gets Milton in there too, and he's
you know going to go ahead and
kill him. Andrew Marvel is another poet
we'll see,
who is on the royalist side,

and of course he's liked by the new
ruler
Charles II. And he has his ear, sort of
indirectly,
and he pleads for Milton's life, and
ultimately
they decide not to kill him. The
interesting thing about it is one of the
arguments he makes is, Milton as you
may know,
by the time he writes Paradise Lost,
which makes it all the more remarkable
an achievement, he's blind,
and he's old, and he's not in particular
great health. And Marvel says well you
know
what can this guy do at this point, I
mean he's just this you know sort of sad,
old, former kind of has been guy,

and the argument holds. But of course Milton then goes on to do the great works of his life, including Paradise Lost, Paradise Regained, Samson Agonistes, these are all remarkable works. And in Paradise Lost, we we won't get into it for our discussion, but Milton actually is taking on the question of what he did in killing a monarch. So what is it a story about? It's how you know this person, Satan, who decides to take on an absolute you know undisputed monarch and fight a war against him. That's exactly what Milton and that band of revolutionaries did,

and now you get to see them after
they've lost, and now that they've lost,
that's the- this is their story. And

Milton

critiques the current government rather
forcefully, and rather amazingly.

So yeah, and I don't know if

Charles II realized the full import of
what Milton was doing in Paradise Lost,
and how he was still

championing his position. Had he done so,
he might not have been so quick to

let Milton

live. Anyhow, so.

“Upon Appleton House,” this is written by

Marvel,

is considered by most people the last

“country-house” poem. They're going to be
some other ones

that are kind of like it in the 17th century, Alexander Pope writes something called Windsor Forest. But for the most part, people believe that when you look at the actual genre of a country house, and as we've noted better called a country a state poem, you'll see that this is probably the last one.

So a very short-lived thing right. So this ends in 1652, and 1652 the first ones we have are by Ben Jonson and Emilia Lanier, and they're just like 40 years before, so it's a very short-lived genre. And why is it short-lived? Because it gets the planet, I would argue, by

the you know local descriptive

literature of the type

of- will be solved with sir John

Denham.

So but it's important to look at for a

few reasons.

It's highly descriptive, so it's almost

on its way to becoming true

loco-descriptive literature.

First, it's very long by comparison,

it's 800 lines in length,

and it makes clear that description is

much more important now.

So in the little chronologies, sort of

genealogy, we've been charting for

how this form grows and matures over

time.

You know you've gone- you have upon the

six times larger than

Penshurst, and it's becoming more and more

loco descriptive. And again, this is in the very era

right after the first great local descriptive work,

Cooper's Hill was written. It's also highly allegorical, and I

want to be clear about that, and it shows how these things are

still transitioning. So you know by the time you get to

true local descriptive poetry, what we would call modern nature poetry, it's

often just

totally about nature, about the

description, about the locale being

described.

You know but here, for example, Marvel

who was you know
strongly anti-Catholic, does an
incredible attack
on the Catholic church, and insinuates
the Catholic nuns are lesbians, and
all sorts of horrible things. So
that's all in there, and some of it
is kind of allegorical as well.

So you kind of have to still be,
if you're looking at this
period, be wary of the fact that we have
full-blown nature writing in the sense
of you know highly local descriptive
poetry at this point in time.

Yeah we're on our way to it, but we're
not quite there.

Upon Appleton House expresses different
perspectives about the environment too,
and that's important to note.

For example, Marvel at one point imagines his patron, which is Thomas Fairfax, as overseeing his garden like a general would an army. So I just wanted to move this up if I could, I don't think it's going to happen, let me see if I can move it here.

-as a general would an army. And you know this then suggests, well it's potentially a very disturbing posture toward the environment because the idea here is that you know we are in control of it, and we have to control it the way an army controls- the way a general controls an army, which is with the stern hand, and regiment, and all. So that's there. So not only

then would Upon Appleton House be very anthropocentric, it's a disturbing variation on that because it suggests you know everything is centered around human beings, but we have to kind of rule it with an iron hand, and that's potentially problematic.

On the other hand, and this is why you know it's such an interesting transitional work-

See if I can fit on the screen here.

There's this description of old growth forest that occurs somewhat later, or later than that in the military description, and it's really a celebration of old

growth forest. So

again, I'm not reading these since I

hope you have the

you know I hope you'll take the time to

do it by hitting the pause button.

But this then becomes you know a sort of

harbinger of what will come with

true

nature poetry, especially those that

celebrate

wilderness and all. So we'll see Mont Blanc,

which is coming

after this, 150 plus years after this.

And that will be you know all about this,

a celebration of a mountain,

and how amazing and wonderful it is.

We're not there yet,

but we're getting there.

And you know it's talking

about a wood as being this incredible
you know green growing ark.

Again, sort of allegorical reference to
the Bible, and there's,
in this passage, reference to the flood
and all as well.

But clearly it's an old growth forest,
it's these massive trees and all. And
it's something that that Marvel is
not only
drawing attention to here, but
increasingly
valuing. And valuing not in the
same way that a few decades before
people were valuing old growth forests in
the time of when Penshurst was
written, because you know you could cut
them down and make a huge amount of
money,

but something different here. The beginning of something big, which is valuing them as wilderness, as nature untouched by human beings, as the very part of nature that is out of the anthropocentric project, that is where people are not, and that's what's so wonderful about this place according to Marvel.

And that's pretty new, and it is going to sort of rule the day that will be important thinking in what's coming.

But it's very clear that environmental attitudes are in flux here.

In a way, it's a good thing to draw attention to since today is our last lecture in the early modern period. He is, for example, you know well aware of the merit of

wilderness both for human beings and

other

life, and that's moving toward

egocentrism.

So that's remarkable, and if you just- you

know if I just had given you those

passages, we could say this is the

beginning of something big,

and it is. But it's also in an older

tradition

too, in a very anthropocentric

tradition where

it is well celebrating human being

control and ordering of nature,

that's an attitude that's going to be

sort of challenged.

Amazingly these two,

and I think you can see them as

conflicting attitudes,

exist together in one poem here.

And they're not really duking it out,
it's not like they're fighting,
it's instead perfectly fine according to
Marvel to have them both together. So
that itself is pretty remarkable,
although one attitude is going to kind
of win that fight as they duke it
out.

Yeah.

This would be something important for
me to note during the actual class, but
here too.

And that is you know most of our texts
that we read, including Upon Appleton
House, come from the course reader,
there are two books that we are going to
read from as well.

One is of course Henry David Thoreau's

'Walden,' and the other is Rachel Carson
'Silent Spring.'

You need both of those for the
course, so if you haven't
ordered them, I'm not sure how quickly
you're going through these
lectures, but you pretty much want to get
on that right away.

And hey you don't have to worry about
shipping or anything if you order
a digital version, a kindle version, of
these books,
or epub, however, in which case you
could get it delivered
right away. So if you're really chomping
out the bit, and you just can't wait
to get it delivered, you can go ahead and
have a digital copy
delivered to you.

That would be a typo there, this is not

John Marvel, but of course

Andrew Marvel, I think that's kind of a

mashup of John Marvel and

John Milton when I was writing this

but. So

there are a number of Mower poems

written by

Andrew Marvel, and they express,

the way I put it here, an uneasiness

toward modification of the environment,

and this is 350 years ago.

So these are important transitional

works

too by Marvel. Again, these are separate

from that long poem Upon

Appleton House, but they showed that

there was an attitude

live and well 350 years ago that will

come roaring into modernity in a big way,
and here we can see the early modern
emergence of it.

And this will, not be too much of a
spoiler,

this will inform discussions that
happen today.

For example, the fact that people are
made anxious by
genetically modified plants, you may know
that that's an issue.

It is in fact less of an issue now than
you may think. You may not know the fact
that

you probably you know you may well be
wearing

products from genetically modified
plants right now, I would argue you
probably are,

and I would argue that you've probably eaten a genetically modified plant within the last 24 hours or so. So why would I argue that? Well in this you know we're in the third decade of the 21st century, over 90% of the wheat, the corn that you're eating now, comes from genetically modified wheat or corn.

You've probably eaten that in the last 24 hour, you might know it in terms of wheat, but in corn you may not think so, but corn is in fact everywhere. Someone noted that I think like 60 of products in a supermarket have corn in them, you might

say what is that all about?

Well yeah imagine you go into

a Mcdonald's you know and you decide to
get a happy meal,

yeah corn is everywhere in that. So first,

in the soda if you're drinking you know

cola sugar sweetened,

it's not sweetened with sugar, it's

sweetened with high fructose corn syrup,

which comes from corn.

If you move to french fries, they're

potatoes

yeah, but they may well be cooked in corn

oil or at least a blend of oil that's

derived from corn. And of course the

burger

may well have in part- the cow may

have been fed corn,

probably it's corn of

soybeans are a big thing that are fed to cows nowadays. And even something like you would say well it doesn't affect the roll, at least I think

Mcdonald's still

sweetens their rolls with high fructose corn syrup to make them taste better.

So it's everywhere, you're eating it all the time, but when you're eating corn all the time, you're eating most likely genetically modified corn.

When I said that you're probably wearing it,

the majority, over 90%, of all cotton grown in the United States as well as India, and India

is another major source of the cotton that we wear,

over 90% of that is genetically modified

too. So that cat's out of the bag.

But you may wonder well what's the

objection to that?

I could give you a

breakdown of it right now, but with

Andrew Marvel 350 years ago, we can

see the objection being made

even though genetic modification wasn't

happening on the same level then, it was

in a certain kind of way, and Marvel was

made very uneasy by it so.

This is the Mower against gardens, and

let me just walk through this.

Luxurious bring his vice in use;

Did after him the world seduce. So

I first need to move this down a little.

So he's talking about what man. And

what he means that, you know even though

it's male,

he means a generic way what human beings
didn't do.

From fields and flowers and plants
allure, Where nature was most plain and
pure. So he starts off
very much like the twists he takes
in Upon Appleton House, talking about
basically wilderness, where nature was
most plain
and pure, this is where human beings
hadn't altered things.

So what does he do? What does- What do
human beings do? He first enclosed within
the garden's square A dead and standing
pool of air.

So what he's doing here is drawing
attention to
the fact that when you build big estates,
like Penshurst or Cookham,

often you build a wall around the place.

Kind of like back where we started with

the Epic of Gilgamesh,

but you do it to protect your property

and to keep it beautiful. So you have

all these wonderful gardens,

then you know no animals and all can get

in. But

to you know Marvel's point of view, what

do they do? They enclose

dead and standing pool of air. Then

yeah a more luscious earth for them for

his plants

did he knead, which stupefied them when it

fed.

So what he's talking about here and

what's bothering him here, which

is not bothering I don't think anyone today,

maybe corporate or business it does. But he's

talking about the fact
that human beings were actually making
the soil
more rich by composting at the time,
people at the time
were very aware of how composting worked,
and they were building up the soil
through their composting efforts. That's
what he's talking about here, and
he's being a little- made a little uneasy
by it, but we'll see the rest what he's
on easy by.

Yup. The pink grew then as double in his
mind;

The nutriment did change the kind. So
this compost- where
composting works, and by the way being an
urban farmer I can tell you it does work,
because it meant that plants

were like growing doubled
their size. And Marvel this is
bothering him.

And in an absolute sense you can see,
this is definite human modification to
the environment, this is not a wilderness
where you know everything is most plain
and pure, this is
change now happening because of human
actions.

Then, some big things come up here.

With strange perfumes he did the roses
taint,

And flowers themselves were taught to
paint.

What he's drawing attention to here is
genetic modification,
not through you know direct you know
working with the genome of plants,

but rather through selective reading,
which you can do
through generations, in which people had
done for for thousands of years,
you can modify plants. Marvel is
concerned about how good people are
getting at it, and how we're doing it
sort of on whim.

So what's happening here? Why do roses
have strange perfumes?

Well we raised them to do that. In other
words,
growers thought well people like roses,
they really smell
you know beautiful, and people associate
beautiful smells with flowers,
why not develop a rose you know
genetically modified through generations
of selective breeding that smells really

good.

And the flowers themselves were taught

to paint. Well

in this era, for example, one of the sort

of holy grails was the idea that you

could create a perfect white rose, which

doesn't occur in nature.

Maybe you've never thought about it, but

if you do think about it and you realize

there's a whole range of roses out in

the world,

ranging from you know red to white to

yellow

and all these other colors, they're not,

for the most part,

occurring in nature. Those were all

created that way because people thought

wouldn't it be cool-

really cool to have a white rose. And as

a consequence,
according to Marvel thinking he's pretty
accurate, the flowers themselves were
taught to paint. In other words, their
genetic
code was modified so they themselves
paint themselves different colors. So
once you've done this,
that rose that you grow, the you know
white one,
is painting itself white basically
in Marvel's way of looking at it.

Let's pull this down again. The tulip,
white, did for complexion seek, And learn
to interline his cheek.

Tulip is a flower that's very popular in
this period. So just as we saw back
when we had Varro that people were
keeping pigeons for

food rather than chickens, here roses were important, but tulips were really big at the time, and the white tulip was actually kind of a real holy grail with a little color in there.

Tulips were so big that its onion root they then so high did hold, That one was for a meadow sold.

So what this is about is that tulips are coming principally from Holland, Holland is a very very advanced genetic modification program going on for flowers, basically they're really good at it. You may know that the tulip comes from a bulb, so it's not like a tiny little seed, but

it's a bulb,

it looks kind of like a little onion if

you're not familiar with bulbs.

But that's what you have to get if you

want to plant a tulip,

and you could just like a seed you can

transplant a bulb

for great distances, and they

last for quite a while.

But you could imagine if someone, a very

wealthy person, had an enclosed garden

and they wanted to have like

the best most amazing you know garden

ever, they would want to have really

exotic plants in it like white

tulips. And he notes here that these

became

so sought after that they became

incredibly expensive,

and actually you could sell a whole meadow, "That one was a meadow sold," and get whatever that would be. Like in modern terms, tens of thousands of dollars you profit, and that's what one of these you know the most rare of all these bulbs cost. So that's what he's saying, so he's drawing attention to why people are just you know really caught up in this project. But it's more, and that is: Another was searched, through oceans new, To find the Marvel of Peru. So these plants, that are so valued here, are not just coming from Europe, but you know we're now in the era of the New World, and you know going to places

like Peru,
and bringing in exotic- what would have
been seen as exotic plants at the time.
So to put that in perspective, beginning
of the early modern period in England,
the period
we keep referencing, the year 1500,
there were about 200 introduced species
of plants
in England, not a whole lot. By the year
1700,
we're approaching that now, that's
technically
you know the way scholars look at it,
the end of the English Renaissance.
There are 20,000 introduced species,
an increase from 200 to 20,000 in that
200 year period,
people are utterly fascinated by these

plants.

Some of them, like what Marvel's talking about here, are just exotic flowers and exotic plants, things you'd want to put in your garden.

Others are more practical, and more of a big deal.

So for example, potatoes get introduced into England and to the British Isles more generally, and that's a major innovation because this is a subsistence food product crop that just takes off.

So you know people with a relatively small portion of ground, like an acre or so, suddenly can you know feed a lot of their family just

on potatoes. There aren't many
crops that can do something like that.
Other things get introduced like tobacco,
becomes a huge
fad, people love it. In fact,
after Queen Elizabeth you might recall
James the first takes the throne as
the new king,
he actually likes to write a treatise on
tobacco telling people not to smoke
because it's bad for your health and
will kill you.
Yeah, 400 years ago people knew that
smoking was bad,
400 years ago the government was telling
people smoking was bad,
and yet people continued to smoke. Anyhow,
all over the world people are searching
for new plants to bring to England.

And Marvel goes even further though: And yet these rarities might be allowed, might be okay to you know genetically modify things or to introduce these new species you know to man that sovereign thing in proud. So this is a little jab at right at human beings, thinking that word you know have dominion over the earth and all. Yes we are the sovereign thing, and we are proud. And by the way, pride is typically you know what's thought of as having brought about the fall, the original sin was one of pride, so you know Marvel here is clearly referencing the Bible. But what does he do then, man, what do human beings do? He dealt between the bark and tree, Forbidden mixtures

there to see. No plant
now knew the stock from which it came, He
grafts upon the wild the
tame. So what's he talking about here?

Well

this is another type of- It's not genetic
modification
per se, but it's of a sort with it.

It's been going on for thousands of
years, it's using reference to it in the
Christian Testament, the New Testament of
the Bible. What he's talking about is
grafting,

and I'm not sure if you're familiar with
how this works. But-

An interesting thing is, you can go here
in Santa Barbara to a local plant
nursery,
and you can buy an apple tree that when

you plant it

will grow three different kinds of

apples.

One red apple- It'll grow red apples,

it'll grow green apples, and it'll grow

yellow apples. These are three different

species of apples all together growing

on one

tree. So how's that being done?

Well that's the process of grafting.

Apples

generally- you do not buy apple seeds

to plant

because they'd be too genetically

unstable,

instead you take

a root of an apple tree that you've

grown,

and it doesn't really matter what kind

too much- Well it does matter in the sense that, and this is the kind of stuff that would be bothering Marvel, you can predetermine how big your tree will be, you can grow a dwarf apple that won't be much larger than a person or a full-grown apple tree that'll you know tower above many houses. So in that sense, you can choose what you want for a tree to be by doing that. But then what you graft on it, the branches you graft on it, you can graft on you know a fuji apple, which is a red apple. You could graft on you know an opal apple, which is yellow. You could

graft on granny smith, which is green, and

the trees I talk about I

think you might even be able to get

those three on one tree.

Marvel was very disturbed by that,

that is really going against nature. And

that's something that's really emerging

here,

and you can see it in this poem

especially, the notion that

the world was created the way it is and

we shouldn't be

messing with nature. The interesting

thing is-

I'll pop back in here if I can. The

mandate at the time

was not to leave nature alone. So we

might say that you know leave

nature and don't change it, but the

imperative at the time was
do not mess with what God created. In
other words,
God, God being God, created the universe
the way he wanted it,
and that comes down to every plant the
way he wanted it.

I mean if you think about how the
multifarious world we live in, it's
astonishing the diversity,
and the idea is well God created
everything just the way he wanted it to
be.

Who are we to go ahead and modify it, to
do these strange you know
transformations, to create whole new
flowers.

Aren't we kind of being like little
Gods ourselves when doing it, and isn't

that the height of arrogance. I mean it's

one thing to

be a good steward of a garden sure,

but

to be a little God and to try to change

things,

yeah. And you know he

says here you know the uncertain

and adulterated fruit, so the fruit that

comes off of say one of these apple

trees might put the palate

into dispute. So you just aren't even

gonna know what kind of

fruit you're eating, I mean not only

doesn't you know

no plant knew the stock from which it

came. So the plant doesn't even know

you know that branch on that apple tree

doesn't know the tree it came from, it's

sort of disconnected,
but we don't even know where like the
fruit came from, it's disconnected as
well.

So that's Marvel's objection, that
you know we've created this strange
new world through genetic modification,
other techniques like this,
bringing an exotic species and all. And
to him this is all going against God's
plan, we shouldn't be doing this. I
mention it because that same basic
attitude, or why we're focusing on this
in
the early modern emergence of this
attitude, that would be alive and well
again
with the you know campaign against
genetic modification. The fact that it's

not you know,
it should be left alone because it's the
way nature- the way
God made it, but now we say it's you know
nature should be left alone because
evolution figured out how everything
should be, and we shouldn't be modifying
it.

So obviously still a big debate today,
even though
you know that the cat's out of the bag
and GMOs are everywhere, it's
kind of not a fight that is
going to change a whole lot in the
United States one would presume.

Although, in places like Europe and all,
the debate still rages on.

So this is a poem called "Man"
by George Herbert, it's a little earlier,

it's 1633.

And I wanted to throw it in however

because

it introduces an attitude that's also

alive and well today,

and actually becomes a very important

argument in the

close of the 20th century especially, and in

the 21st too.

Herbert like Marvel was anxious about

the loss of indigenous plants.

So the flip side of bringing in

20,000 introduced plants

into England is that what was happening

is indigenous plants that didn't have

value to human beings, and this would be

a very anthropocentric attitude right,

they were being replaced by these new

species,

an increasingly larger monoculture. So an example that would be potatoes and all, suddenly everyone was like you know planting potatoes wherever they could. And as a consequence, you know people like Herbert and Marvel, who like the idea that nature should be as God intended it and not changed, are going to be worrying. And they're going to worry about, specifically in Herbert's case, the loss of indigenous species so.

And here's what the argument comes down to, and this is why it's a modern argument.

You can say that a plant that we don't use for any

purpose, in other words, there's no anthropocentric purpose for it right, we can't figure out a way to use it, you could say that has no value. Herbert would like to say well wait a minute, do you know that it has no value, maybe it does have value. And if it does, if it potentially has a kind of value, then we really need to like pause, stop, and think, and don't destroy these plants. That argument is going to be made in a more complex way once we start seeing the notion of ecology pop on the scene in the 19th century, that there is a value of a vastly interconnected ecosystem. And every little player in that, even the

most seemingly insignificant plant that
has no
direct value to human beings, is very
important.

But let's see what Herbert's argument is
here.

This is from this little poem called
'Man,' which by the way
will get quoted by people afterwards. So
the works that we're looking at here all
get

referenced later and taken up by people,
in this case for example by Ralph Waldo
Emerson, who was the mentor
to Henry David Thoreau. Here's the poem.

More servants wait on Man, Then he'll ever
take notice of: in ev'ry path He treads
down that which doth befriend him, When
sickness makes him pale and wan,

Oh mighty love! Herbs gladly cure our
flesh,

because that they Find their
acquaintance there.

So what's going on here? Well so man,
it's human race, and in a very
anthropocentric way.

We tread down things in our path,
and this would be you know we
destroy plants that are in our path, and
that would mean
indigenous plants that we just rip out
and get rid of.

But these plants might befriend us
when sickness makes us pale and wane,
oh mighty love. So let's go to the next
line, which is actually not the next line,
but I'm
putting it- there's more lines there, but

this is the next one and they
continue the thought. Herbs gladly cure
our flesh, because that they Find their
acquaintance there.

So what's going on here? He's arguing
that
plants, in the sense of medicinal herbs,
cure human beings
when we are pale and wane. So when we're
sick,
we need medicine. And where do you get
medicine? You get medicine at this time
principally from plants. And I would
argue, in our period as well, many of
the medicines that we have
come from- were basically herbal remedies
or certainly their plant-
they're derived from plants even though
they may be synthetic at this point.

So he you know would argue that human beings need plants, especially when we're sick, even if we don't know it, and we might be treading down something that is incredibly important because you know it could be a medicinal herb.

This argument pretty much exactly will emerge again in a big way in the 1980s.

So at that point in time, environmentalists are drawing a lot of attention to the rainforest across the planet, especially Brazilian rainforest, and they're arguing you cannot destroy this place.

There are different ways you could argue the value of it. You could say it's the

lungs of the world, which is true in so far as it absorbs and sequesters an enormous amount of CO₂, which it you know brew pulls out of the air and puts oxygen back into the air, so it's working as a lung, just the opposite of a human or animal lung, which takes in oxygen and sends out CO₂. So it's very important in that way. You can argue for its preservation in lots of ways. But one of the arguments that came about, and was really you know propounded, and kind of resonated with a lot of people, and that was the hope anyhow, was that- It was typically you know

putting a very simple motto:
don't destroy the rainforest because
they're all these plants there
that we've never
looked at, and never
discovered,
never analyzed, and one of them may cure
cancer.

That was the argument. Yeah well first,
in the third decade of the 21st
that seems a little problematic because
we now know the cancer is
not like a single disease that's
going to have a cure like that, it's a
very complicated
range of problems rather than a
single disease.

But okay, maybe though you know to modify
the phrase you know there may be a

cure there for
any number of diseases, or if not a cure,
then treatments for diseases,
and we just don't know because you know
we're
recklessly destroying this place and all
these plants
before we even know what we're
destroying.

That is exactly the argument that
Herbert is putting forth here,
that you know what people were
doing in England at that time
was not you know South America, but in
England itself,
was the same exact thing. They're all
these plants that you know some of them
people knew had medicinal value, but a
lot of them people just didn't know,

people hadn't taken the time
to study them and to try to figure
out just what they had.

And you know irrespective of that, other
people are just destroying them saying
wow we need this
room to plant you know potatoes, and
tobacco, and pretty flowers,
and Herbert is going to be you know sort
of mortified by
them. You can see with Herbert
and- Let me just pull out of this so I
can make a
closing statement, and we'll go back to
the beginning,
and I'll pop up on the screen. You can
see here,
even though in this period you know
wilderness hasn't

come front and center for environmental thinking, the stage is being set for that. It's being valued, it's showing up in literature more and more, we see it in you know Upon Appleton House where it's this incredibly important part of the estate, this sort of wild part. In a way, it becomes sort of the most valuable part of it. And not only is it valuable in the sense of it being aesthetically beautiful, and you go there and you're sort of rejuvenated, but also it may have real value for us, we are more connected to it than we might think. And Herbert makes that argument by the

way

because at the time people actually thought that medicinal herbs found their acquaintance, they had like a connection to us directly.

So human beings were- These plants were sort of tailor made to help us.

And why not? If in this thinking, if it's created by God and God has created this place,

why wouldn't he fill it with things that could help us if he

thought so. And people did see things like that, as you know

God sent, that it was sent by God.

But anyhow, what we're seeing here is sort of

wilderness coming on the scene. And the biggest

part of that, the biggest- I wouldn't say

biggest part, but

the signaling of it is probably this.

When Milton writes *Paradise Lost* in 1667,

he starts using the word nature with the

capital,

and he does it with God and all too, but

you know we normally reserve

like the word God and all. Nature

suddenly is being seen

as something like a big deal. That

you know way of writing and all

is going to carry through to people like

Thoreau, and everyone is going to-

you know all the sort of

proto-environmentalists and all are

going to love talking about it that way.

But what Milton does in *Paradise Lost* is

redefines

nature, and we've seen you know
the history of nature going back to
the ancient Greeks and the idea of
Physis, and

we saw how that needed to be
understood temporally rather than
spatially.

Milton is clearly in a modern tradition
of understanding it spatially.

But if you look up in say the Oxford
English Dictionary, the OED, which is
the definitive English dictionary-

In fact, if you actually
have the paper version, the print
version,

it's like 20 volumes, like the size of
encyclopedia, it's a dictionary.

And one of the things that the OED does
is look for the etymology of words, where

they first occurred.

And the word nature has, I think I mentioned in the earlier lecture, like at least 60 different major meanings. But one comes on the scene in 1667 and it's put there by Milton, and that is that nature is what is separate and apart from humans. We saw way back in the Epic of Gilgamesh that that was sort of implied, but Milton is the first one to begin thinking of it in a modern sense, in a sense of like wilderness, being what is completely and apart from human beings.

So it is a binary structure and opposition, which we saw

that way back in lecture two, and
it is clearly here nature that's being
preferred. This
is- You can see Andrew Marvel doing it,
you can see George Herbert doing it, you
can see Milton
in certain ways doing it, they are really
fascinated by
nature separate and apart from human
beings.

That attitude will come roaring
into the 21st century, and it's going to
have all sorts of people
taking it up, and advancing it, and
developing it further.

I keep mentioning like Wordsworth and
Thoreau, but there are many many people
who are going to do it.

And it wouldn't have happened if that

shift hadn't been codified the way it
was in Milton,
and others, but Milton is really the first
to think of nature
as separate from us and as this true
wildness, which
our word wilderness derives from the
idea of being wild.

So we're going to see that again and
again. So we'll leave the early modern
period now.

And I'll stop talking because I
note here that we actually have a shot
in
pulling a lecture in under one hour.

I'm sorry that they
always go longer than that, but this
will be the lecture that's under an hour
long if I'm doing the time

keeping right.

So next time we're going to be moving forward considerably in time as we complete the last one third of the class.

Okay so see you next time.