

Steven J. Tepper – ArtsFund 2017 Luncheon Keynote Speech

Thank you Kara, that was a beautiful introduction. It's great to be here today. You know, ArtsFund has such a long history, almost 50 years. It's one of the best funds of its kind in the nation—many people look to it as a model—so it's great for me to be here today.

I want to start with a number: 104. Does that mean anything to anybody in the room? It's not the number of tables. It's the temperature that will greet me when I return to Phoenix tomorrow. And my wife also called this morning to tell me that she found a scorpion in the bathroom. So no matter what happens in the next fifteen minutes, I'm really happy to be here with you today.

I also want to let you know that there is a notebook on your table that is a gift from ArtsFund, and I encourage you to doodle, to draw. Not because I think you'll be uninterested in what I'm saying, but actually the cognitive science research suggests that if you are doodling and drawing you will remember the talk better, you'll be more focused, you'll be more present. So good luck, as long as your doodles don't look like that with the word "yawn" in the middle of it, I think we'll be okay.

Look, I want you to have a road map for today's talk. I'm going to talk about some good news, and then I'm going to talk about bad news, then good news, then bad news, then end with good news. So let's start with the first of the good news, which is that we are in an unbelievable moment in the history of mankind. We have never seen the kind of progress we've seen over the past 200 years or even the last 20 years. This is remarkable. This is from the *Economist*. Almost a quarter of all the goods and services made over the last 2,000 years were produced in the last decade. And that's controlling for the size of our population. We are the most productive we have ever been. And when we look at global rates of poverty and health, we see remarkable statistics. 50% of the world's population was undernourished 70 years ago. Today that number is down to 11%. And others—in 1800 only 12% of the world could read and write, today we're at 85%. Since 1900, the global life expectancy has almost doubled. It's now up to 70 years. The global rate of extreme poverty—this is remarkable—in 15 years alone we have gone from 43% to 20%. 68% of the world's population now has access to modern sanitation. Just 30 years ago it was 24%. These are unbelievable numbers.

In the history of the world, we have never been more productive, we have never been safer, healthier, wealthier, educated, connected than we are today. Yet, more people than ever feel stressed—stress levels are up by 30%. And it turns out the millennials are twice as stressed as retired people, so stress levels seem to be increasing for our youngest generations. Optimism has never been lower than it is today—an all-time low. Over half of the people in America feel like children today will have a worse future than their parents. It's the first time in the history of this survey

that we are on the north side of 50%. And as Sherman [Alexie] said, trust in every institution is down, and it continues to fall. We trust our media less, we trust our doctors less, we trust our teachers less, we trust our cultural institutions less, we trust our newspapers less, we trust our government less, and we trust each other less. Only 30% feel most people can generally be trusted in this world. 71% of Britons think the world is getting worse. Only 5% think it is improving. And of Trump supporters, 80% think life has grown worse in the past 50 years. So this is an incredible puzzle. We never have been better, but we have never felt worse. That's what I want us to think about—why is that the case?

It's the case because we have also never experienced change the way we are experiencing it now. We are at an accelerated, unbelievable rate of change. This is incredible: the rate of urbanization is equivalent to the construction of a city of a million people every 5 days for the next 40 years. In China, just in the last 3 years, they've poured more cement than in the entire 20th century in the US. By 2020, a \$1,000 computer will have the processing power of a human brain. I think my human brain is running an Atari 1973 model 2600, so that's not that impressive. By 2040, that same computer will have the power of every human brain on earth combined. This next slide shows the adoption of technology; how fast we are adopting it. The telephone-- it took about 35 years before a quarter of the population had adopted the telephone. It took 7 years for the web to be adopted by a quarter of the population, and for smartphones it is about half that time. So technology adoption is moving quickly.

And the economy is changing in ways that are unimaginable. 47% of the occupations today won't even exist in the next few decades according to the *Economist*. And most people will experience non-linear career paths—25% of all 18 to 44 year olds will hold 15 or more jobs in that time period. The average now is 11. So the idea that we will get a job, will work our way up the ladder, will follow some kind of straight pathway is simply not true, and it won't be for our children and for the next set of generations. And of course, we all know demographic change is dramatic. 2010 was the first year more non-white babies were born than white babies in this country, and we are heading toward a majority non-white country. There are major cities that are already there.

So this rapid change is causing extraordinary amounts of anxiety. In a recent survey, 73% of all survey respondents said that they greatly fear that things are changing too fast these days. Now when we're facing this kind of change, there are really only two responses. The first is fear. So cognitive science, sociology, anthropology, they all show us that when we are facing change our natural response, our threat response, is to feel fearful, to hunker down, to close up, to protect. The other response is creativity. To imagine the future. To imagine how to adapt to the change. So that's it. We're facing unbelievable change. You saw the statistics about how it makes us feel. Anxiety and fear are the natural responses. Creativity is the alternative. So fear leads

to all those things that are undemocratic, unproductive, that work against innovation: intolerance, suspicion, anger, incivility, cognitive closure --when we don't want to listen to new ideas -- lack of innovation.

Creativity, on the other hand, leads to an opposing set of ideas and attitudes and feelings and experiences: novelty, optimism, the ability to be resilient, to be adaptable, to be innovative. So, the president of Pixar says that the unpredictable is actually the ground on which creativity flourishes. But this is not a given. We have got to fight for that to be true. We have to fight for creativity to emerge in times of rapid change and high anxiety. It's not the natural response.

So here's my argument. The arts are, I think, the single most important lever that we have as a society for moving from fear to creativity. And again, those are the two responses to change.

Okay, so first let's talk about creativity and its rise in American society and globally. A survey of the top 1,500 CEOs in America find that the number one thing that they are looking for in today's graduates is creativity, above everything else. So what is creativity? What are these core 21st century competencies? It's the ability to improvise. To deal with ambiguity. To radically rethink your ideas. To take risks. To not be afraid of failure. To have expressive agility- to be able to state your ideas across multiple platforms and mediums to many different audiences. To be able to have conditional thinking and to ask those sort of big "what if" questions, those "if-then" questions. The ability to work together on emergent, collaborative, creative teams where the solution is unknown. The ability to find problems, not just solve existing problems that someone else presents to you. And perhaps most importantly, the ability for empathic reasoning, to be able to think about how someone else might be feeling and to be able to put yourself into their shoes.

The creative economy is growing fast—it's one of the fastest growing parts of our global economy. The core copyright industries today add \$2.1 trillion to GDP. That's 3 times the size of the construction industry. Of course, in 2008, all the indicators of a healthy economy looked to construction, but in fact if we weren't protecting and taking care of our copyright industries, our economy would be much more challenged.

Richard Florida, the bestselling author, talks about the rise of the creative class. People are working with symbols, with stories, with narrative, with games, with film, with publishing—that this is one of the fastest growing parts of our workforce. And importantly—and if you look at this slide long enough you will believe everything I say— he says that this creative class wants to live in interesting and creative cities. Places that activate creativity. Places where serendipity can happen. Places where they can rub shoulders with artists. Places where they can feel inspired. And it turns out that Seattle is among those places. You have a net migration of creative class

workers. In fact I think you're ranked 7th of all US cities according to Richard Florida. Creativity is a rising value for young people. 92 % of graduating seniors say that choosing a career that allows them to be creative is among their top priorities for what they want to do in life. 92%—it's above almost every other goal and aspiration for that generation. So, the argument is that engagement in the arts actually drives creativity, not just for individuals, but for entire communities.

Richard Florida again has shown this relationship between artists and economic growth—the Bohemian Index, the number of artists that live in a city is correlated with economic growth for cities, and is one of the stronger predictors. We know, this is a study in Philadelphia, that neighborhoods that have large clusters of arts organizations, those in the top quartile of arts organizations in a neighborhood, see increased property values. It turns out Mark Stern at University of Pennsylvania also shows that poverty is reduced in those neighborhoods. So we tend to think the arts just drive gentrification, but that's actually not true. The arts actually create more stable neighborhoods as well.

We know that patent holders are 30% more likely to have studied the arts sometime as children. And we know that 93% of STEM honors graduates have some musical training compared to 34% of American adults. And this is amazing—Robert Root-Bernstein, Michigan State, looked at all Nobel Prize winners and found that winners of the Nobel Prize are 4 times more likely to be musicians, 17 times more likely to be visual artists, and 22 times more likely to be performers than those scientists who did not win the Nobel Prize. So there's clearly a link between participating in the arts and activating all kinds of neuro-patterns that lead to invention and scientific discovery. We know that in those patterns when cognitive scientists and neurologists and neuroscientists look at the area of the brain that gets activated when people are solving puzzles, when they're making non-routine connections, when they're thinking with analogies, when they're trying to identify patterns, it's the same part of the brain that lights up and gets fired when people are also engaging in the arts. And we know that the brain is stimulated by playing music. The executive function of the brain is enhanced, memory is enhanced. It turns out creativity is not a right-brain activity, it is a both-brain activity. And the more neural pathways across the brain, the more creative we are. And it turns out that people who play musical instruments have those diverse pathways across their brains.

We also know from Shirley Brice Heath that kids who participate in after school arts programs—this is a controlled sample—were 5 times more likely to ask “what-if” questions in class, “how about” questions, those questions that fire the imagination to think differently. And we know that designers who work with theater artists to do improv before their design process are much more likely to come up with more innovative designs. And it turns out that a science major, if they add an arts minor or an arts double major, earn more than science majors who didn't—\$6,000 more. And Wayne Clough from Georgia Tech was so convinced in the power of music to make

better engineers that he charged admissions officers at Georgia Tech to search for those applicants who had a background in music.

And look, it is hard to find a silver bullet for anything. As a sociologist, we are constantly looking for that variable that has the biggest impact on improving quality of life. It turns out that if there was a silver bullet, it would be the arts. The evidence is so strong and so robust: arts engagement increases retention for college students; the arts reduce pain for chronic illness; the arts improve memory in aging; they are associated with higher quality of life and higher levels of wellbeing; improved feelings of safety in neighborhoods; they are associated with higher levels of tolerance; associated with higher levels of civic participation and volunteerism; gains in empathy; gains in confidence; reduced stressed levels for kids in poverty; and I could go on and on and on except the slide could only take that many bullet points. The arts have been shown over and over again now for decades by researchers working in many different disciplines to be unbelievably effective for advancing human wellbeing and community wellbeing. Oh, there was one more: increased school engagement and persistence.

Okay, so here it is. Given the pace of change, we need the arts more than we have ever needed them before, and—or but—given the priorities and perceptions in the public about the arts, we need champions for the arts now more than ever before. It's not a given that people see the value of arts. Just a few weeks ago George Will called to terminate the National Endowment for the Arts—"what do we need it for?"

We know arts education is not a given. It turns out that levels for white children have remained more or less the same nationally, but for minority kids, we've seen reductions of 49% in access to arts education. Almost half of the high schools in America don't even teach dramatic arts. There is no theatre education in more than half of the high schools in America. And this is crazy—given the robust contribution that artists make every day, that 26% of the population feel that artists contribute little or nothing for the general good of society. Nonprofits working every day in the arts, they are barely making it. Over 50% of our theatres can't make it 3 months given their cash situation. Most nonprofit arts organizations are undercapitalized and struggling. And metrics push the arts out of schools. We now spend 1.7 billion dollars administering standardized tests in schools. In Texas, by the time you graduate you have spent 34 full days doing standardized tests. That doesn't feel like a creative environment right there, yet our schools are more and more looking like that (*image of hundreds of kids taking a test*) for more days of the year. And divergent thinking, when we're kids, 98% of 3 to 5 year olds report a genius score on divergent thinking. That's just how their brains work. It drives us crazy, if you have kids that age. By the time we're older adults, only 2% of us score at that level. School teaches us not to think creatively, not to be divergent thinkers. And we're experiencing a creativity slump. Since 1990, scores on creativity tests which have been administered since the

1940s, the Torrance Test, we've seen declines in scores over the last few decades even as IQ scores go up.

So this is it. These are the only two options, and they work against each other. We're either going to have fear. We're going to retrench. We're going to close out new ideas. We're going to try and protect what we've got. Or, we can go toward creativity. We can drive innovation. We can drive new ideas. We drive openness. We can drive empathy. We can drive connection. We can adapt, adjust, reinvent our world. Reimagine what's possible.

There are an extraordinary amount of artistic assets that we have at our possession to move from fear to creativity. If you think about it, what is the one profession that wakes up every day trying to move from fear to creativity? There's only one, and that's artists. That is what artists exist to do. There is not a single other profession with this mandate, with this obligation. And we've got a lot of artists—2 to 3 million professional artists, 130,000 new arts graduates every year from American colleges and universities, over 100,000 nonprofit arts organizations trying to make their communities better places, and then all of you out there who don't call yourself artists who might be designing software or running businesses and companies but have a kind of a double agent identity. You do the arts, you make art, you have an artistic hobby or passion.

We will not win if we're leaving this balance to just a few artists. We have got to mobilize creativity in everyone, and we've got to take advantage of the fact that we have extraordinary creative assets in our community. Every community has an artist. Every community has an arts organization. They need to bring those artists and those organizations into the center of public life and help us drive towards creativity and away from fear. We have to wake up every day and fight for this, because it is not automatic.

So I want to end with Buckminster Fuller, who says that, "We are called to be architects of the future, not its victims." But we have to fight for this. And it starts with fighting for the arts every day. So thank you.