Welcome to your 43rd annual SCCM Congress. Forty-three is a substantial number. That’s a long time and a lot of highly skilled, determined, and visionary critical care professionals came before us. Many of you wonderful people are here with us today. We stand on your shoulders, the shoulders of you amazing professionals, and together we are tasked to build the future of critical care medicine. To each of you, we thank you for all that you have done.

So, what future will we build? What does this future look like? Well, here’s a thought: critical care is all around us. What does that mean? What are the ramifications of boundlessness? Let’s talk about that. Our critical care roots are historically linked to geography. In the beginning, we created boundaries. We intended for these boundaries to be protective. We created boundaries in order to concentrate the patients, the people, the tools, and the drugs. We created actual physical boundaries.

This helped us to create a sense of purpose, so historically critical care has been described by a place, a location. But for some patients, it even became an exclusive destination. And we made rules, house rules. For a long time, we even made family members ring the doorbell and ask permission to enter our house. We spoke like this: “Hey, the Jones family is ringing the intercom and wants to come back. Would you hit the button and buzz them in? Thanks.”

So who is allowed to enter our house? Which patients, which healthcare professionals? Are you on the team? Do you have permission? Is your ICU open, or is it closed? By the way, this open/closed way of thinking has not always been helpful. Our goal has always been to define who is most likely to benefit from life-saving care. But who actually decides all of these things? We all spend many hours discussing these questions, attending the meetings, writing policies, seeking compelling data to guide our way.

This may be uncomfortable, so before I continue, let me pause here and offer you some preemptive reassurance. Yes, we still need ICUs. Yes, we still need to cluster the sickest patients around our teams with advanced, highly developed critical care skill sets. And yes, the multiprofessional team is still vital. But we need to do more. We know this, but let me say it anyway: this place called an ICU is not the whole story for critical care. Our future is bigger than the ICU.

So what happens when we acknowledge that our existing boundaries have become restrictive? Restrictive to families, restrictive to other caregivers who participate, restrictive to other patients who would benefit from our care. Today, these traditional boundaries hinder our efforts and hinder our further growth. So should we simply expand these boundaries, or should they be dissolved altogether? That is what I want to talk about with you today. Where are we going? Here are several major boundary challenges that require all of us to roll up our sleeves and to work together.

First, how do we more efficiently and accurately identify, locate, and provide the right care to critically ill patients no matter where the patient is located? We need more precise and predictable systems of care, more reliable methodologies, and better infrastructures that overcome human factor limitations. We must ensure that the care reliably and predictively finds the patient, not the patient finds the care.

Second, what about critical care prevention? This is related to the first point. Our job is not simply to treat critical illness; we are equally tasked to prevent the need for critical care. Badness prevention: this has several definitions and connotations. The most efficacious critical care is the critical care intervention that a patient never needs. Our true jobs lie in the prevention of critical illness. The ICU should become a location, a way station, a purgatory to be avoided if possible. Critical care prevention is not just for patients who are peering into the abyss; this is not just-in-time rescue. In fact, these responsibilities extend well beyond our current concepts of rapid response teams and the like. Some of these patients are right under our noses in our ICUs. They have delirium, they are weak, they are bedbound. Other patients who need critical care prevention are not in an ICU; in fact, some are not even in the hospital—patients at risk...

DOI: 10.1097/CCM.0000000000000349
of deterioration, patients predisposed to sepsis or other cata-

trophic conditions. Some patients have these predilections
encoded in their genes. Others teeter precariously every day
with multiple disease comorbidities and chronic critical illness.

Chronic critical illness: these patients unravel and land in
our ICUs. Our treatment goal is to establish or reestablish their
tenuous equilibrium state. We do things; we can’t really fix any-
thing. When these fragile patients leave our units, what hap-
pens? Now what? How do we assist? How do we actively help to
sustain their tenuous equilibrium and prevent the need for ICU
readmission? For some patients and their families, acknowl-
edging that life ends, not readmission, should be our focus. So
where are the boundaries for all of these responsibilities?

Third, who is on the critical care team? More boundaries. By
necessity, our definition of team is evolving. Our multipro-
essional ICU teams variably include members beyond the geo-

graphy of an ICU and perhaps even the hospital. That readmission
for congestive heart failure: we initiated furosemide, but if we
don’t make sure that this treatment is continued, then who is
responsible? If not you, and you, and me, then who? Where are
the boundaries of our critical care teams and their responsibili-
ties? Primary care physicians, nonhospital providers, even fam-
ily members and the patients themselves: how do we ensure that
these vital people are fully integrated team members as well?
Who becomes the critical care band director across boundaries?

Fourth, how do we appropriately meet the growing needs for
critical care services? Today, there are more ICU sick patients
than there are people and resources allocated to care for them.
This is true for academic medical centers, community hospi-
tals, and other ICUs where our patients are admitted. We can’t
reasonably fill this gap by building more ICU beds and then
staffing them with traditional critical care teams. That is a geog-

raphy-based approach to a problem that is much bigger than

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raphy-based approach to a problem that is much bigger than

geography. Besides, this approach is neither affordable, practi-
cal, nor sustainable. So again, who else is qualified to participate
in the provision of critical care? Which providers? How much
training? Many US hospital-based providers who are not for-

mally trained in critical care provide a large volume of criti-
cal care services today and everyday. Given these realities, how
should we define and measure our critical care competencies?
And what about critical care outreach, or regionalization of ICU
care, or electronic virtual technologies? Do these approaches
extend our boundaries? What do we still need to invent? How
do we link all of these team members and technologies together
across boundaries into highly functional teams?

Fifth, do we continue our attempts to build works of art in
our ICUs? Traditionally, we have embraced a masterpiece-like
approach to critical care medicine. Our most complex ICU
patients become masterpiece paintings, a masterpiece painting
assembled by many. Each masterpiece is unique, individual–
bold strokes, light, shadow, an expression of being. All of our
critical care masterpieces are resource-intensive, but unfortu-
nately, some masterpieces are not as masterful as others. These
patients would benefit from us powerfully shifting our focus
away from unique creativity and more to predictability. So what
are the boundaries between individualized masterpiece care
provided by a team of many and predictable high-reliability
care provided efficiently and with fewer resources?

Sixth and finally, what constitutes a successful ICU outcome?
We recognize that success is not simply defined by a patient
leaving the ICU alive. Historically, by limiting our focus to the
geography of an ICU, we have not addressed, at least not ade-
quately, a really big and important factor. Surviving an ICU stay
can have huge and negative consequences, catastrophic con-
sequences, for patients and families. Some of these post-ICU
consequences are iatrogenic. Unfortunately, for many of our
patients and their families, we do not have an adequate post-

ICU safety net. We do not have sufficient healthcare, commu-
nity, and other support systems in place to help restore these
families and these patients to their pre-ICU baselines.

That is an overwhelming list, but it is happening now; ready
or not, here we are. For all of us, meeting these challenges will
fundamentally change our practice of critical care medicine.
We are all standing together astride a major inflection point
for critical care medicine. Inflection point: we use that phrase
a lot—too much really—but what we have just enumer-
ated, these challenges, these truly require an inflection point
mind-set or we will not make the necessary changes. As they
say, go big or go home. So who will lead this change? Simply
stated: all of us. We are all leaders by necessity. The essence of
critical care is collaboration: collaborative leadership and col-

laborative decision making.

How do we fit all of these things together? Obviously, there is
not a bright shining light, a unique formula, or one approach to
address these tough challenges. Many times, remedies develop
ad hoc, locally unit by unit. Many are clever and innovative,
but many are simply bandages. Remedies are not necessarily
solutions, and rarely are they durable solutions. We must work
together to address these questions of geography and questions
of boundaries as enumerated here today. We need to tackle
these challenges together. We need to address these boundar-
ies head on: direct, clear, concise, systematically, with discipline.

You know this one: in an elevator, someone asks you, “So what
exactly are you trying to accomplish?” And then you have only
a few seconds to give your response directly, clearly, concisely.
So what is our elevator answer? What exactly are we trying to
accomplish? Well, here it is: we need to tear down more walls.
That historical phrase is a bit grandiose, but it is accurate. Critical
care across boundaries, this defines our inflection point: together.

I cannot close my remarks without recognizing the impor-
tant role of our families and our loved ones. I have an ama-
zing family, I truly do. Our kids are wonderful. They’re talented
people; they are committed to the well-being of others. They
are committed to making the world a better place. What more
could a parent want? My wife, Beth: we don’t deserve her. She
has always stood for what is right and what is good. Every one
of us in my family, our family, is sustained by her love. And we
depend, every day, on her profound wisdom. My family: we
will always love and take care of each other.

For all of us here today, we give everything we have to our
patients and to critical care—and then we go home. Our tanks
are empty, and our families and loved ones often take the hit.
And the next day, we do it all over again. So I will ask just one favor of each of you. When you next go home, stop what you are doing and tell the ones who love you, the ones who give us sustenance, tell them that you could not do what you do without them. Touch them with your love and your appreciation, please.

The staff members and the leaders of SCCM are amazing, from David Martin, our CEO, to each and every staff member. They are dedicated, talented, and wonderful people. They are an awesome family, too. Please stop them in the hallways during this Congress, and thank them for all that they do for each of us.

And most importantly, I want to share my deep, deep admiration and profound respect for those who do the work of critical care, for every one of you. It takes a special person with a sharp mind and a soft heart to work in the ICU. Like firefighters, police, emergency medical technicians, and mothers, you run toward the crisis, into the burning building, to the broken body, beside the skinned knee. Each day, you navigate that fine line between compassion and dispassion, simultaneously reaching out to touch families and patients, while assimilating complex data and problem solving with the detached eye of the professional that you are. I so deeply admire and appreciate what you bring to your job, day in and day out, for the betterment of our ICU patients and their families. I am so proud to be your colleague.

So let’s work together. Together we will tackle these boundaries, these tough challenges. Let’s work together to tear down more walls.