



Dirt

What Our Children May Be Losing While We Keep Their Hands Clean

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A Word That Will Not Leave Me Alone

For some reason, the word dirt keeps coming to mind. That happens in this somewhat bizarre mind of mine. A word settles in, pulls up a chair, and refuses to leave. I do not always know what it wants, but usually it means something is brewing.

This time, it is good old dirt. Under your fingernails. On your knees. Tracked across the kitchen floor. The kind that leaves a ring around the bathtub and makes your mother wonder whether you brought half the neighborhood home with you. It is, pardon the pun, a grounding word. And the longer I sit with it, the more I think about children and what happens when childhood loses its dirt.

I recently spoke in Cottonwood about building adolescent resilience, a subject I also addressed at a medical conference in Williamsport and explored in the book Dr. Russell Gombosi and I wrote together. Underneath that work is a question that will not leave me alone: Are we giving children the experiences they need to become capable, adaptable human beings?

Jonathan Haidt raises a related concern in *The Anxious Generation*. He describes a profound shift from childhood organized around play to childhood organized around phones. We have restricted children's freedom in the physical world while opening an enormous door into the digital one (Haidt, 2024).

I keep coming back to a simpler picture. We traded dirt for digital, and I wonder whether we fully understood the bargain.

When the *Bathtub* Told the Story

When I was a boy, we went outside in the morning and came home when the streetlights told us it was time. Yes, I *know*. Every aging fellow eventually tells this story. Bear with me. Some clichés survive because they contain something worth remembering.

We rode bicycles, built things, argued, made up, fell down, and invented something to do when we got bored. If you came home with a minor scrape, the response was roughly, “Is your leg still attached? Good. Put a Band-Aid on it and go back outside.” There was an expectation that ordinary bumps and bruises were part of participating in life.

I remember Doug Murphy flying down Trinidad Avenue at approximately Mach 5 on his little bicycle. At the T intersection, he discovered that his ambition exceeded his ability to negotiate the right turn. The mailbox won, and Doug received an unscheduled lesson in physics, including momentum, inertia, and the unpleasant consequences of stopping much more quickly than you intended.

I do not recommend mailbox collisions as a curriculum. But I remember a childhood in which the world gave us feedback, and we gradually learned to respond. We learned our limits, developed judgment, and discovered that a little pain did not necessarily mean catastrophe. At the end of the day, the bathtub told the story.

My childhood was hardly perfect, and nostalgia can conveniently forget a great deal. Still, those experiences gave us repeated opportunities to test ourselves in the physical world. We were participants, and participation sometimes came with dirty fingernails.

An Immune System Needs an Education

The dirt itself deserves attention. For years, researchers have investigated how early microbial exposures help shape the developing immune system. The useful idea is more specific than “germs make you stronger.” A healthy immune system must respond to genuine threats while tolerating harmless substances. Diverse environmental microbes can help educate that regulation.

In a widely discussed study of Amish and Hutterite farm children, researchers found substantial differences in asthma, allergic sensitization, household dust exposures, and innate immune responses. Their findings supported a protective role for certain traditional farming exposures (Stein et al., 2016).

Another study brought forest floor material, sod, and planting opportunities into urban daycare yards. After 28 days, researchers observed changes in the children’s microbiota and immune markers consistent with improved immune regulation. The study did not establish that playing in dirt prevents allergies, but it offered an intriguing demonstration that changing children’s everyday environments can influence their biology (Roslund et al., 2020).

Think about that for a moment. A patch of living earth may offer experiences a disinfected plastic surface cannot. The natural world contains an extraordinary community of microorganisms, and our bodies develop in relationship with that world.

Handwashing still matters, as does avoiding contaminated soil and dangerous infections. Children do not need to become sick to earn a healthy immune system. Allergies have multiple causes, and cleanliness alone does not explain them. But ordinary outdoor life, with plants, soil, and microbial diversity, deserves a place in childhood. We should be careful about treating every encounter with dirt as a failure of parental vigilance.

Resilience Requires Practice

The word resilience comes from the Latin *resilire*, meaning to leap or spring back. Compression is a useful image, although it is not the literal meaning of the word. Something encounters pressure, bends, and recovers (Lewis & Short, 1879).

Children need opportunities to practice that recovery. They need manageable challenges, appropriate responsibility, and people who help them find their footing. Developmental research makes an essential distinction: manageable stress with support can foster resilience, while overwhelming or prolonged adversity without adequate support can undermine it. The challenge and the relationship both matter (Center on the Developing Child at Harvard University, n.d.).

Immune development and emotional development are different processes. Evidence about one does not prove a claim about the other. Yet both invite us to reconsider the assumption that removing every challenge produces the healthiest child.

As a Christian, I see something of God's design in our capacity to grow through engagement with the world. Effort followed by rest. Challenge met with support. A difficult moment followed by the discovery, "I can do this." Those experiences help a child develop confidence grounded in something real.

We cannot manufacture that discovery by doing everything for a child. Sometimes we have to let the child struggle with the knot, work through the disagreement, or attempt the climb. We stay available, offer guidance when needed, and allow room for growing competence. Occasionally, that means watching those beautifully clean shoes disappear into the mud.

The Bargain We Made With Screens

Too many children now spend hours sitting before a device while the physical world waits outside. What gets displaced is substantial: movement, sleep, conversation, unstructured play, and the experience of making something with their hands. Children also lose opportunities for the small negotiations through which they discover that other people have needs, preferences, and opinions.

A randomized study involving 89 families found that a two week reduction in recreational screen use improved children's reported behavioral difficulties and positive social behavior. The study

was short and does not answer every question about technology, but it gives us reason to take those displaced experiences seriously (Schmidt-Persson et al., 2024).

Child psychiatrist Victoria Dunckley addresses related concerns in *Reset Your Child's Brain*. She uses the term “electronic screen syndrome” to describe a pattern of dysregulation she associates with screen exposure. That is her clinical framework rather than an established standalone diagnosis, but her concern about children becoming overstimulated deserves thoughtful attention (Dunckley, 2015).

The image that comes to my mind is a slow IV drip of stimulation. One more notification, one more argument, one more comparison, and one more video engineered to make stopping feel almost impossible. There is always something else demanding attention, stirring emotion, or promising a reward.

It can feel like a cortisol drip, although that is a metaphor. We cannot assume that every child using a screen has persistently elevated cortisol or that screens directly cause autoimmune disease. The question is already serious enough without stretching it: When does that child get to settle? When does the body move, breathe, recover, and experience the reassuring presence of another human being?

A childhood can become crowded with stimulation while remaining strangely short on experiences that help a child feel capable and connected. A device can keep a child occupied for hours. We still need to ask what those hours are contributing to the child's life, and whose priorities are filling them.

Let Children Have Their Childhood

And now, allow me a brief rant. I cannot quite help myself on this one, because I wonder whether it belongs closer to the center of the discussion. Alongside our concerns about screens, we need to examine the adult agendas delivered through them and sometimes carried into classrooms and consulting rooms.

I am particularly concerned when adults turn gender into an urgent identity project for young children, as though childhood requires an accelerated timetable for deciding who they are. Children deserve time to develop an understanding of their bodies, their interests, and themselves without pressure to adopt a label or arrive at an adult's preferred conclusion.

Developmental psychology has long examined how children understand these categories. Kohlberg's classic model describes a progression from labeling oneself and others, to understanding stability over time, to recognizing constancy despite changes in clothing or appearance. These understandings generally emerge across the preschool and early school years, with individual variation. The model does not, by itself, establish that discussing gender diversity harms children. It does remind us to take children's developing understanding seriously (Ruble et al., 2007; The Open University, n.d.).

A boy can be gentle, a girl can be adventurous, and neither needs to interpret those qualities as evidence that something is wrong with their body. Interests, temperaments, and preferences deserve room to unfold without adults rushing to assign them a larger meaning.

Educators, physicians, and psychologists should understand developmental psychology well enough to distinguish a child's own questions from questions adults are imposing. When a child expresses uncertainty or distress, that child deserves compassion, careful listening, and thoughtful exploration. My objection is to adults who let ideological certainty outrun their curiosity about the individual child.

For goodness' sake, leave some room for bicycles, beetles, friendships, and muddy shoes. Childhood should not become a battlefield on which adults recruit children to settle their arguments. That is a burden we place on them, and it has precious little in common with the good, honest dirt that helps make childhood a childhood.

The larger principle extends well beyond this particular concern. We have a responsibility to offer children challenges suited to their development while protecting them from pressures they should not have to carry. Learning to negotiate a friendship is one thing. Being recruited into an adult's cultural crusade is another.

A Body Built to Engage and Recover

That distinction brings us back to regulation. In my NeuroFaith® work, I return repeatedly to the importance of helping people respond to life without becoming trapped in a state of defense. A healthy nervous system needs flexibility. It must mobilize when action is required and settle when the demand has passed.

In polyvagal language, I often describe the experience of safety and social connection as a ventral vagal state. The practical goal is the ability to engage, respond, and recover. Constant calm is hardly a realistic goal for a child who wants to race a bicycle, climb a hill, or play an enthusiastic game of tag. Excitement belongs in childhood, too.

Our hearts and brains participate in that ongoing bodily conversation. Sensory nerves, including the vagus, carry information toward the brain, while cardiovascular receptors register changes in pressure and blood volume. This is living physiology, constantly adjusting to what the body is doing (Liu et al., 2026; Zhao et al., 2022).

Watch a child running, laughing, stopping to catch a breath, and then crouching beside a friend to inspect a beetle. There is movement, attention, curiosity, recovery, and relationship. The child has an actual world to respond to, with experiences that invite the body and mind to work together.

A beetle does not care how many followers you have. A hill cannot be scrolled away, and a garden asks you to wait. Dirt has absolutely no interest in maintaining your carefully curated image. I find that refreshing.

Adults Need Some Dirt, Too

These questions belong to adults as well. I cannot reasonably tell a child to put down a phone while I remain welded to mine. We have our own endless feeds, urgent messages, and carefully defended reasons for sitting still. We can spend an entire day mentally agitated and physically underused, then wonder why we feel so disconnected.

We also have a tendency to organize away every inconvenience. We want immediate answers, predictable outcomes, and relief from the smallest moment of boredom. It becomes harder to teach patience, adaptability, and perseverance when our own lives leave little room to practice them.

Getting children back outside will require some changes from us. We may have to tolerate muddy floors, imperfect projects, and the discomfort of watching a child attempt something we cannot completely control. We may have to make room for boredom long enough for imagination to arrive. We may also have to resist the temptation to turn every childhood experience into a lesson serving our own preoccupations.

Sometimes we simply need to join them. Plant something together. Walk a trail. Build a crooked little fort. Turn over a stone and see who lives underneath it. Give children responsibilities that matter and enough time to figure things out. Let them come home with a story that happened somewhere beyond a screen.

There is something humbling about entering a child's world without trying to manage every inch of it. We might discover that the afternoon needs very little from us beyond our presence, our attention, and a willingness to get our hands dirty.

Let the Bathtub Tell a New Story

I am beginning to understand why this word has been following me around. Dirt represents contact with a living world that asks us to participate. It gives us something to touch, something to tend, and occasionally something to stumble over. It reminds us that growth takes time and that a meaningful life involves some mess.

Our task as adults is to make room for that growth. We can provide protection without removing every manageable challenge, guidance without scripting every discovery, and love that gives children the confidence to try. We can pay attention to what their development requires, even when it asks us to put aside our devices, our impatience, or our favorite arguments.

As a Christian, I find comfort in the thought that God made us for life within His creation. There is room here for work, play, relationship, wonder, and rest. A child kneeling beside a garden bed, absorbed in something alive, is participating in that world with a fullness of attention many of us would do well to recover.

We need places to put our hands, use our muscles, practice our courage, and discover that an ordinary disappointment can be survived. Our children need those places, and so do we. They

give us opportunities to experience life directly, with all its inconvenience, surprise, beauty, and occasional scraped knees.

Perhaps we can put down the phone, open the door, and leave enough room in the afternoon for something unscripted to happen. Let the children explore. Stay close enough to help and far enough back to let them discover a little of their own strength. We might even discover some of ours.

Maybe some of what we are searching for is waiting outside. And maybe, by bedtime, the bathtub ought to show a little evidence that we found it.

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