

Dear friends of clinical journal club - load the latest file down at <https://www.mdc-berlin.de/cjc>. This website also gives you access to my seminar on Wednesdays 16:00 English and 17:00 German. You need to click on *Besprechung beizutreten*. If it fails to work immediately, keep on clicking.

A baby girl was noted to have severe swelling and discoloration of the left arm immediately after birth by cesarean section at 38 weeks' gestation. Prenatal ultrasonography at 28 weeks had shown soft-tissue swelling of the left arm of undetermined cause. Examination showed swelling, cyanosis, and limited movement of the left arm, shoulder, and chest. Two areas of constriction were present at the wrist and proximal forearm, although brachial and radial pulses remained detectable by Doppler ultrasonography. MRI showed two fibrous bands extending through the deep fascia. What is the most likely diagnosis? You are offered: Congenital amniotic band sequence, Congenital lymphedema, Klippel–Trenaunay syndrome, Phlegmasia cerulea dolens due to upper-extremity venous thrombosis, and Neonatal compartment syndrome. Tie a band around your own wrist and figure it out! More evidence is needed to inform recommendations for intervals of colonoscopy surveillance after polyp removal. In an ongoing noninferiority trial conducted in eight European countries, investigators randomly assigned patients with high-risk adenomas to undergo a first colonoscopy at 5 years after polyp removal or at 3 years; surveillance at 3 years is currently recommended in guidelines. The 3-year group also underwent colonoscopy at 5 years. The primary end point is the cumulative incidence of colorectal cancer at 10 years. The 5-year group did “no worse than” the 3-year group. Metabolic acidosis is common in critically ill patients and is associated with organ dysfunction and death. Sodium bicarbonate is used to correct acidemia, but its benefit in patients with metabolic acidosis who are receiving vasopressors remains uncertain. In a pragmatic, adaptive, double-blind, randomized trial, investigators assigned adults with metabolic acidosis (pH, <7.30; base excess, no more than -4 mmol per liter; and partial pressure of arterial carbon dioxide, ≤ 45 mm Hg without intubation or ≤ 50 mm Hg with intubation) who were receiving vasopressors in the intensive care unit (ICU) to receive either sodium bicarbonate or placebo (5% dextrose). Sodium bicarbonate or placebo was infused for up to 5 hours, with the infusion rate adjusted for a target pH of at least 7.30 and base excess of at least 0 mmol per liter. The primary outcome was a major adverse

kidney event. Infusing sodium bicarbonate was not helpful. Blinatumomab, a bispecific T-cell engager targeting the CD19 antigen on B cells, may offer an option to safely replace cycles of traditional chemotherapy in pediatric patients with newly diagnosed high-risk B-cell acute lymphoblastic leukemia (ALL). Investigators randomly assigned children with high-risk B-cell ALL to receive two cycles of blinatumomab (blinatumomab group) or two cycles of chemotherapy (control group) after consolidation. The primary end point was event-free survival. Blinatumomab was as good as and probably better than conventional chemotherapy and could spare these children morbidity. Playing in the dirt and exposure to allergens early appears to make children more robust. Immune responses leading to food allergy may develop early in life, potentially before the introduction of solid foods. Exposures to food allergens in utero and through breast milk have been proposed as a strategy to prevent food allergies in infants, but evidence from randomized trials is lacking. In a multisite, randomized trial, pregnant women whose unborn child had at least two biologic family members with medically diagnosed allergic disease were eligible to participate. Participants were assigned to follow either a diet featuring lots of egg and peanut or not. Then, the breast fed their infants. The primary outcome was IgE-mediated egg or peanut allergy in the infant at 1 year of age. Sounds great but alas, it did not work. The N Engl J Med review is on esophageal cancer. The mystery patient is a 62-year-old woman, undergoing extensive chemotherapy causing anorexia, dysgeusia, and xerostomia. She develops memory loss, anhedonia, gait disturbances, and temporal wasting. In the Lancet, we confront again the issue of beta blocker therapy in post-MI patients who have an ejection fraction $>40\%$. This pooled analysis indicates that stopping the beta blocker was “noninferior” to continuing the drug. A bacterial lysate is a preparation made from broken-down bacterial cells used to stimulate the immune system against common infections. The product is called OM-85. Does OM-85 really prevent wheezing lower respiratory illness in preschool children? A randomized controlled trial indicates probably not! The PD-L1 antibody, durvalumab, is an effective check-point inhibitor. In the MATTERHORN Study, persons with gastric or esophageal cancer received fluorouracil, leucovorin, oxaliplatin, and docetaxel (FLOT). They were then randomized to durvalumab. Durvalumab improved outcomes, even overall survival. The Lancet review is on the environmental impact of wildfires. Lancet

comments on meta-analyses and I include metaphysics. In Science Magazine, we learn that AI interprets abdominal CT scans “no worse than” and probably better than human radiologists. A second article introduces us to the germline *EGFR* T790M mutation and lung-cancer risk. In the Washington Post, we discover that Trump has now banned CNN, MS NOW, and Politico from the White House. Only press reports by sycophants remain. Load down the file and join me again on September 23, 16:00 English and no German presentation this week.

Sincerely, Fred Luft

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