

Effective use of topical corticosteroids: There's an app for that!

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Opportunity to enhance topical corticosteroid prescribing

- Access to dermatologists is limited yet skin conditions are frequent in the community.
 - Dermatologic conditions affect 20-36% of patients in PCP offices
 - However PCPs report diagnostic and management uncertainty.^{1,2}
- Prescribing topical corticosteroids can be tricky or nuanced, so there are opportunities to support clinicians through a clinical decision support.
 - PCPs have been shown to prescribe either inappropriately high-potency TCS or, conversely, inappropriately low-potency TCS.³
 - In addition, drug costs may be higher if multiple small units are dispensed over a treatment course rather than one large unit.⁴
- Skin conditions can be more effectively treated by PCPs by facilitating treatment recommendations to ensure stronger steroids are used (when appropriate) and patients are prescribed a sufficient amount.

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Can an App do that?

- Mobile devices and apps provide significantly increased access to point-of-care evidence and, with use by providers, demonstrate better clinical decision-making and improved patient outcomes.^{5,6}
- Our goal was to develop a point-of-care decision support app for PCPs in order to facilitating effective topical corticosteroid prescribing.

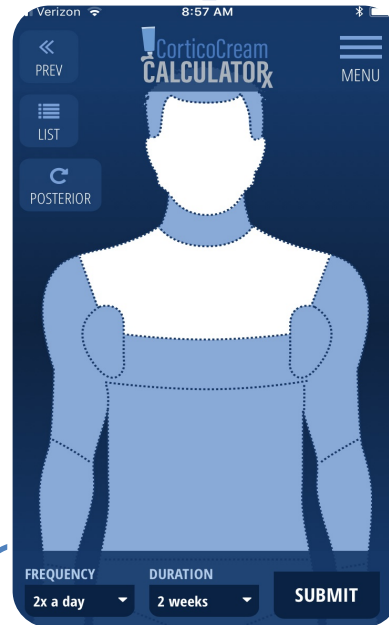
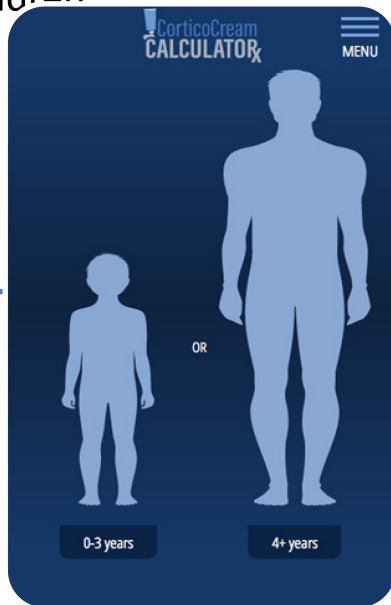
5. Aungst TD. Medical applications for pharmacists using mobile devices. *The Annals of pharmacotherapy*. Jul-Aug 2013;47(7-8):1088-1095.

6. Ventola CL. Mobile devices and apps for health care professionals: uses and benefits. *P & T : a peer-reviewed journal for formulary management*. May 2014;39(5):356-364.

Methods

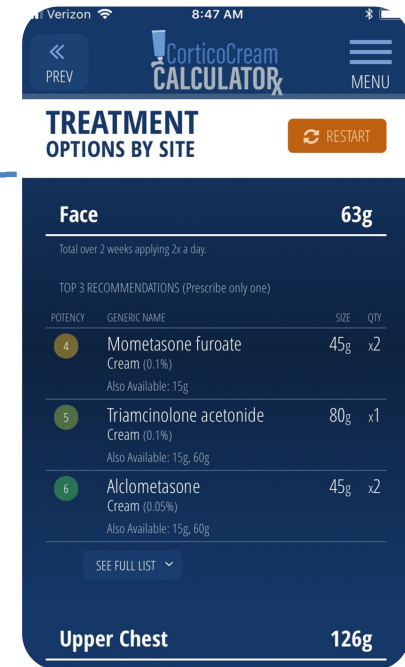
- The app was developed using recommendations derived from a systematic literature review of clinical practice guidelines.
- A multidisciplinary group designed the app in iterative rounds of design and evaluation
 - The group included professional app designers, PCPs (3), and dermatology providers (3).
- To evaluate the effect of the app on actual prescribing, a second group of PCPs were recruited to use the app in clinical practice for three months.
- What did it look like...?

- There are only 2 screens before clinicians get treatment recommendations
- 1. This screen collects patient age group, allowing for specific recommendations for young children



- 2. Select the location of the rash, then at the bottom specify the frequency of use and duration.

- The app displays recommended steroid by potency, for each body site with suggestions for vehicle and amount.



Available at: www.CorticoCreamApp.com

Free download in app stores, look for: **CORTICOCREAM CALCULATOR**

The CorticoCream Calculator app – it makes it easier to appropriately prescribe topical steroids.

- A study at Penn State with Family and Community Medicine physicians compared topical steroid prescriptions before and after use of the CorticoCream Calculator app.
 - There was a change away from low-potency and towards high-potency steroids. Low-potency prescriptions decreased from 25% to 22.6% after initiating use of the application. High-potency prescriptions increased from 16.0% to 19.0%.
 - There were changes in the use of various steroid formulations. There was an increase in gel (1.0% to 2.0%) and solutions (1.9% to 3.1%) formulations.
 - Larger volumes were used more often. Medium-sized tubes (45-60g) increased by 10% (38.2% to 48.2%) while small tubes (15-30g) decreased (42.0% to 36.3%).
- In addition, clinicians had greater certainty about prescribing topical steroids.
 - Feeling certain about the quantity increased from 30.8% to 46.1%.
 - Feeling certain about the vehicle increased from 30.8% to 61.5% .