Geriatric Dermatology

Taking the best care of your oldest patients

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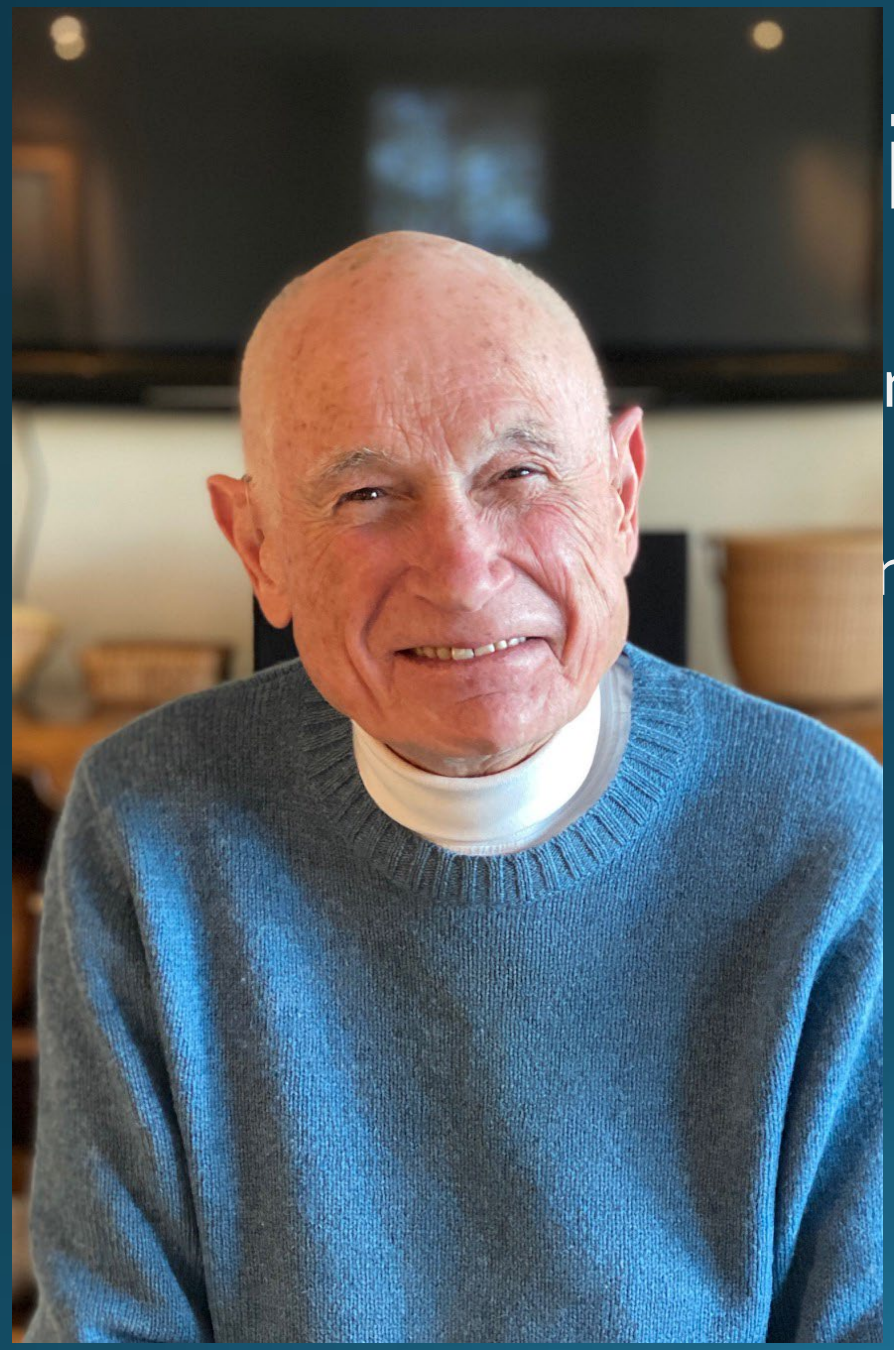
Conflicts of Interest

I have no conflicts of interest regarding material in this presentation…

…except that there are and have been older people in my life who are important to me!



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- …except that there a r people in my life who are important to me!
- … and my husband is

Why geriatric dermatology?

- If you are not a pediatric dermatologist, you are already a geriatric dermatologist
- Just as children are not just small adults, our older patients are not just adults who have lived longer

https://mcc.gse.harvard.edu/resources-for-families

https://www.claudiablackcenter.com/

https://www.nih.gov/news-events

Learning Goals

- What is geriatric dermatology?
- Why might we want to treat older patients differently?
- What skin conditions are more common in older patients?
- What issues arise with prescribing medications to older patients?
- What is a suggested overall approach to treating older patients?

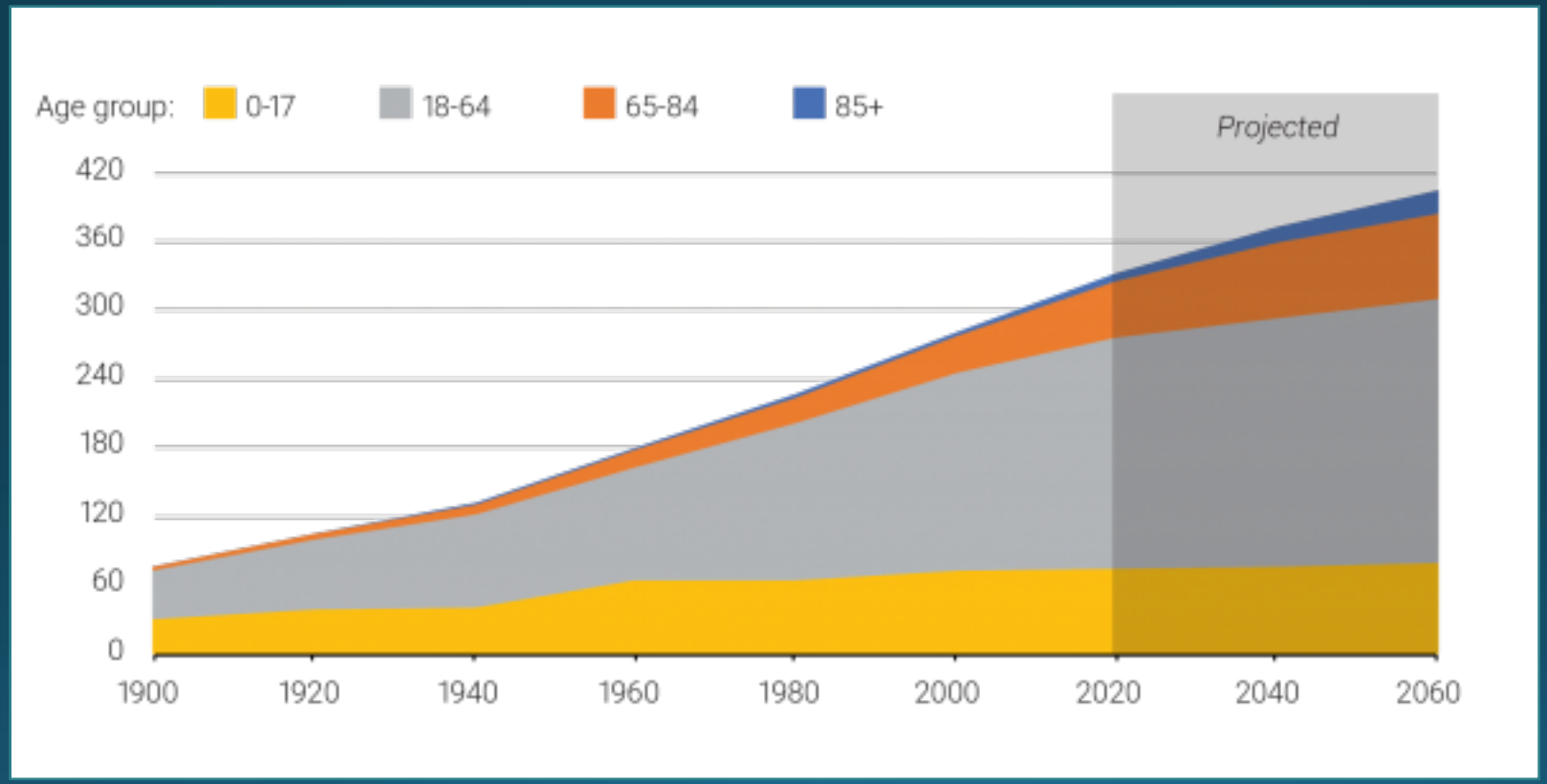
Some Termin

- Geriatrics: Care of older people
- Geriatric dermatology: Applying geriatri
- What age makes you an older person?
  - The "young" old: 65- 74
  - The "middle" old: 75-84

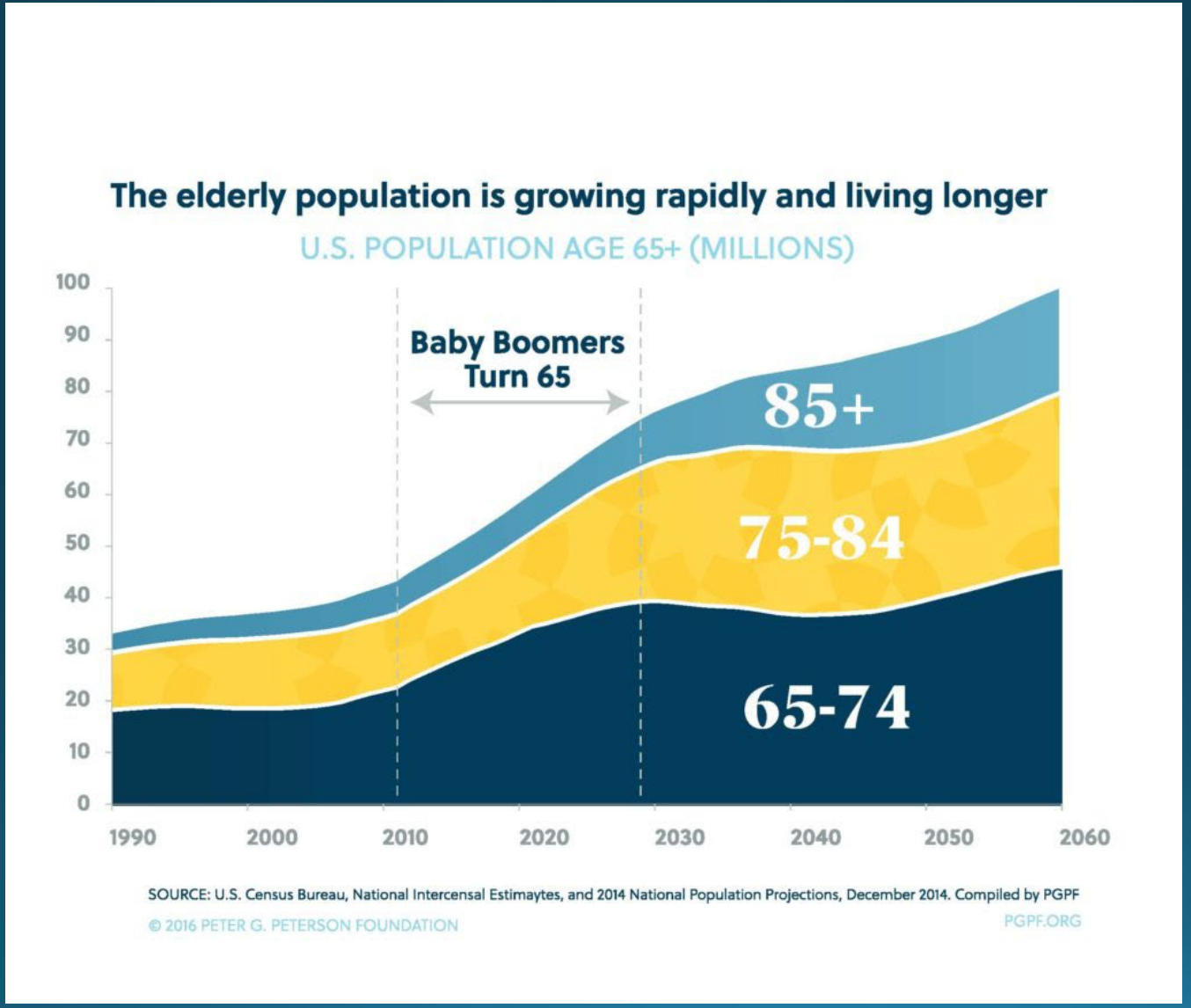
Some Termin

- Geriatrics: Care of older people
- Geriatric dermatology: Applying geriatri
- Wh[illegible]son?

Aging of US population



Aging of US population



What is different about older patients?

Skin Differences (due to intrinsic aging and environmental factors):

- Changes in epidermal barrier function: decreased skin hydration
- Wound healing: decreased fibroblast function with increased skin and blood vessel fragility, decreased elasticity, and slower wound healing
- Immune function: fewer antigen-presenting cells, shift in immunity toward Th2 predominance
- Lipogenesis: decreased secretion of skin surface lipids, decreased subcutaneous fat
- Vitamin D synthesis: decreased
- Sweat production: decreased

Internal Differences: changes in renal and hepatic function, metabolism, cognition, etc.

What is geriatric dermatology?

- Geriatric dermatology is application of principles of geriatrics to dermatology

Geriatric Dermatology—A Framework for Caring for Older Patients With Skin Disease

Eleni Linos, MD, MPH, DrPH[1]; Mary Margaret Chren, MD[2]; Ken Covinsky, MD[3]

JAMA Dermatol. 2018;154(7):757-758.

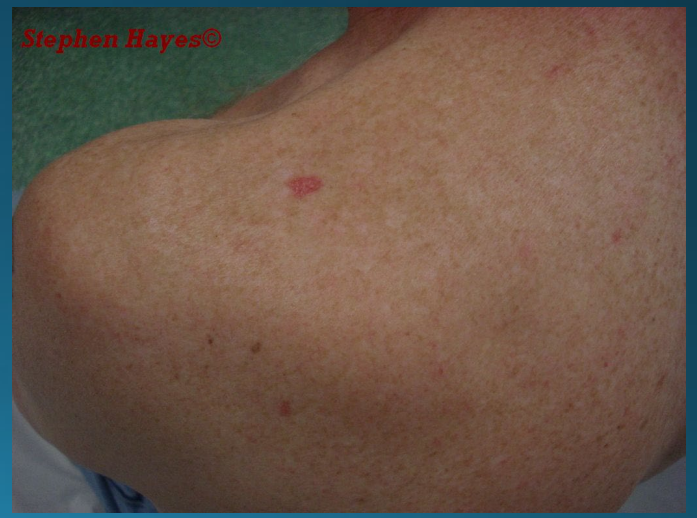
Principles of Geriatrics Applied to Dermatology

Principle: Life expectancy is more than age

Relevance to Dermatology: How do we approach treatment of conditions that may not cause harm immediately, for example, low-risk basal cell carcinoma?

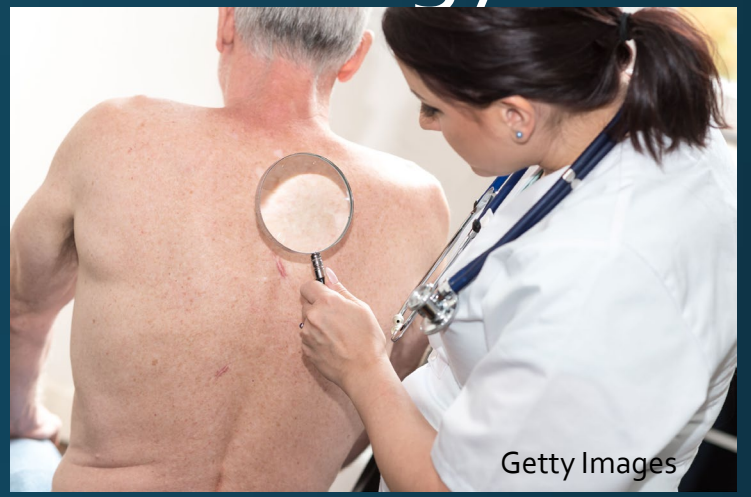
Example:

- A healthy 80-year-old may expect to live another 10 years, making treatment of low-risk BCC worthwhile
- An 80-year-old with many comorbidities may not live long enough to benefit from treating the same BCC



Linos et al *JAMA Dermatol.* 2018;154(7):757-758

Principles of Geriatrics Applied to Dermatology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Principle: Lag time to benefit

Definition: the time between an intervention and the time when improved health outcomes are seen

Relevance to Dermatology: Skin cancer screening examinations

Example:

- Screening an older patient who is healthy may detect skin cancers that would impact their life or health
- Screening older patients who are very ill and not likely to live more than a few years is unlikely to improve their lifespan or functioning

Linos et al *JAMA Dermatol.* 2018;154(7):757-758

Ethical issues related to skin cancer screening in older patients

- We know that rates of non-melanoma skin cancer are increasing (5.4 million per year in US), especially in older patients, BUT:
- New York Times study showed 55% increase in biopsies on Medicare recipients between 2005 and 2015
- This was associated with rise of private-equity-backed practices deploying advanced practice providers to nursing homes
- More than 100,000 BCCs are treated each year in patients over 65 who die within one year of treatment
- Study of 121 BCCs biopsied with positive margins showed only 7% grew or recurred after 5 years
- Whom should we be screening and when should we biopsy?

Haffner K and Palmer G. NYTimes 11.20.2017. Linos E, et al. *JAMA*. 2014;312(10):997–998. Rieger KE et al. *J Cutan Pathol*. 2010;37(1):59-67.

Principles of Geriatrics Applied to Dermatology

Principle: Risks of polypharmacy and medication adverse effects

Relevance to Dermatology: We prescribe medications that may be of concern in older patients

Considerations when prescribing to older adults:

- Many older people have reduced renal and/or hepatic function
- Certain medications have longer half lives (due to changes in volume of distribution)
- Older patients may be on many drugs making drug- drug interactions more likely
- Activity level and diet and can impact how medications work

Linos et al *JAMA Dermatol.* 2018;154(7):757-758

Prescribing medications to older patients

Beers Criteria

- A list of medications of special concern in older patients
- Developed by Dr. Mark Beers and colleagues at UCLA in 1991
- Began as a list of medications to avoid in nursing home patients
- Later updated and expanded to apply to all older adults

Harvard Health

Prescribing medications to older patients

Beers Criteria

Five general categories:

1. Potentially inappropriate medications
2. Medications potentially inappropriate in patients with certain diseases (e.g. heart failure, dementia, Parkinson's)
3. Medications to be used with caution
4. Potentially inappropriate drug-drug combinations
5. Medications of concern in renal insufficiency

Prescribing medications to older patients

What drugs are of concern in dermatology?

- Sedating antihistamines (hydroxyzine, diphenhydramine, etc.): sedating, anticholinergic (special concern in those with glaucoma or BPH), increased risk of falls, delirium; Even so called "non-sedating" antihistamines can cause sedation in older people. Among second generation antihistamines, fexofenadine is preferred
- Antidepressants (amitriptyline, doxepin): anticholinergic, sedating, may cause hypotension
- Antipsychotics (olanzapine): increased risk of stroke and dementia
- Pain medications (NSAIDs): increased risk of peptic ulcer, GI bleeds, hypertension, renal disease
- Antiseizure medications (e.g. gabapentin): can cause dizziness, somnolence, amnesia, depression, gait disturbance, increased risk of falls; also has interactions with alcohol, antidepressants, opioids, benzodiazepines

Prescribing medications to older patients

What dermatologic drugs are of concern in patients with renal insufficiency?

- Certain antibiotics:
  - Cephalexin: renally cleared
  - Ciprofloxacin: risk of seizures, confusion, tendon rupture
  - Trimethoprim - sulfamethoxazole: may worsen renal function, cause hyperkalemia
- Methotrexate: increased levels, need to use lower doses
- Spironolactone: hyperkalemia
- Valacyclovir: needs to be renally dosed

Drugs that interact with warfarin: azathioprine, cephalosporins, ciprofloxacin, macrolides, fluconazole

Prescribing medications to older patients

Principles of prescribing to older patients:

- Prescribe only essential medications
- Avoid high risk medications that can cause delirium, constipation, urinary retention, or have drug interactions
- Start low, go slow
- Be aware of drug interactions
- Identify and address barriers to medication adherence (perceptive, cognitive, organizational)
- Consider comorbidities that can cause adherence problems (e.g. hand arthritis or shoulder immobility)
- Periodically reassess patient's medication list

Prescribing medications to older patients

What about biologic therapies?

- Potentially much safer than conventional immunosuppressing drugs due to lack of organ toxicities and drug interactions
- Study of dupilumab in patients over 80 years old showed comparable efficacy and safety to that in younger patients
- Caveat: Increased risk of cutaneous T cell lymphoma in patients treated with dupilumab, particularly in those over age 60
- A systematic review of psoriasis biologics shows they appear to be as effective and safe in patients over 65, though severe adverse events were more common in older patients
- A large registry study in the Netherlands showed a higher rate of biologic drug discontinuation in older patients due to lack of efficacy, but comparable rates of discontinuation due to side effects as in younger patients

Patruno *et al.*. JEADV **35**: 958 (2021); Mandel et al., Dermatologic Therapy **2024**; Sandhu et al., JCMS 2020; ter Haar et al. Drugs and Aging 39 (2022)

Principles of Geriatrics Applied to Dermatology

Principle: Cognition

Relevance to Dermatology: Patients with cognitive deficits or dementia may have trouble communicating symptoms, understanding instructions, making informed choices, and cooperating with examination and procedures

Example: Performing a skin biopsy in a patient with dementia may

- cause anxiety for patient
- provoke agitation and behavioral symptoms
- pose a challenge for surgeon to do safely
- lead to difficulties with wound care due to dressings being removed by patient

Linos et al *JAMA Dermatol.* 2018;154(7):757-758

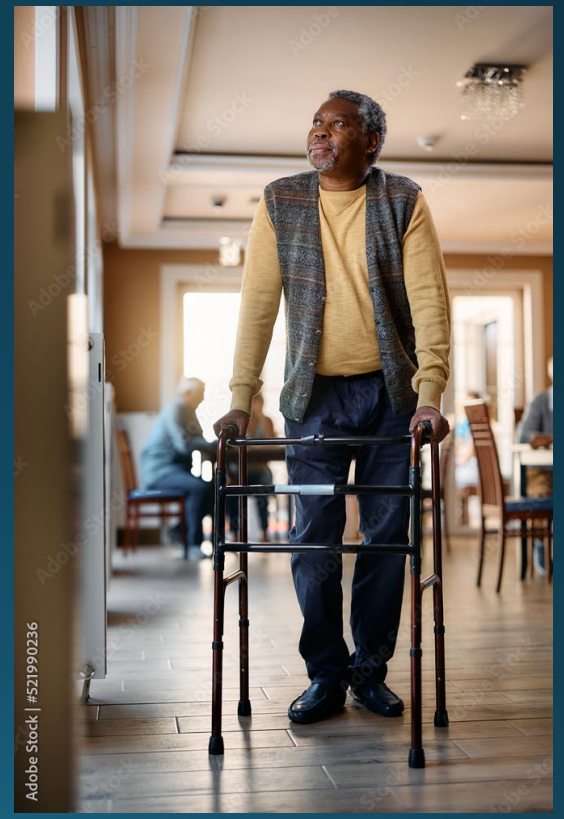
Principles of Geriatrics Applied to Dermatology

Principle: Function and mobility

Relevance to Dermatology: Wound healing, office visits, dressing changes

Examples:

- Wound healing may be slow due to difficulties with dressing changes or wearing compression stockings
- Patients may have difficulty getting to the office if they can no longer drive
- Pressure ulcers may develop due to immobility



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Principles of Geriatrics Applied to Dermatology

Principle: Caregivers and social support
Relevance to Dermatology: Some older patients depend on family members or caregivers to attend office visits and carry out home care

Examples:

- Patient who needs weekly visits for Unna boot changes but can't drive
- Patient who needs help at home with putting on compression stockings, using topical medications, or performing wound care after surgery
- Patient who is unable to provide their own history

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Principles of Geriatrics Applied to Dermatology

Principle: Patient preferences matter

Relevance to Dermatology: Not every condition we diagnose needs to be treated

Examples:

- Some older patients may wish to treat actinic keratoses whereas others may prefer to leave them alone
- Some patients may be capable of self-treatment at home with topical chemotherapy agents whereas others may not
- Some patients may tolerate discomfort of cryotherapy whereas others may not

Linos et al *JAMA Dermatol.* 2018;154(7):757-758

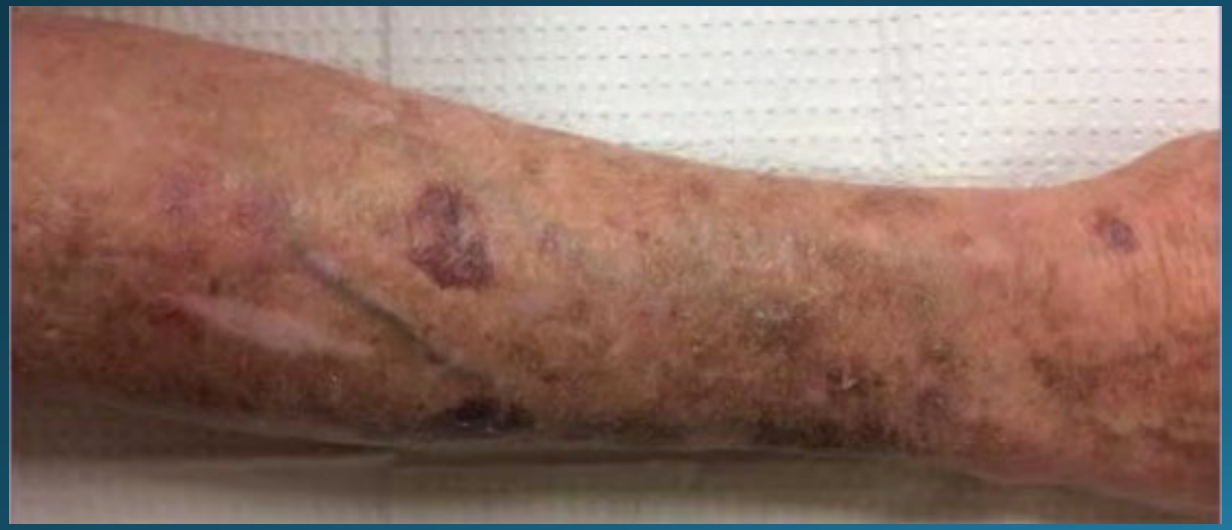
What skin conditions occur more commonly in older patients?

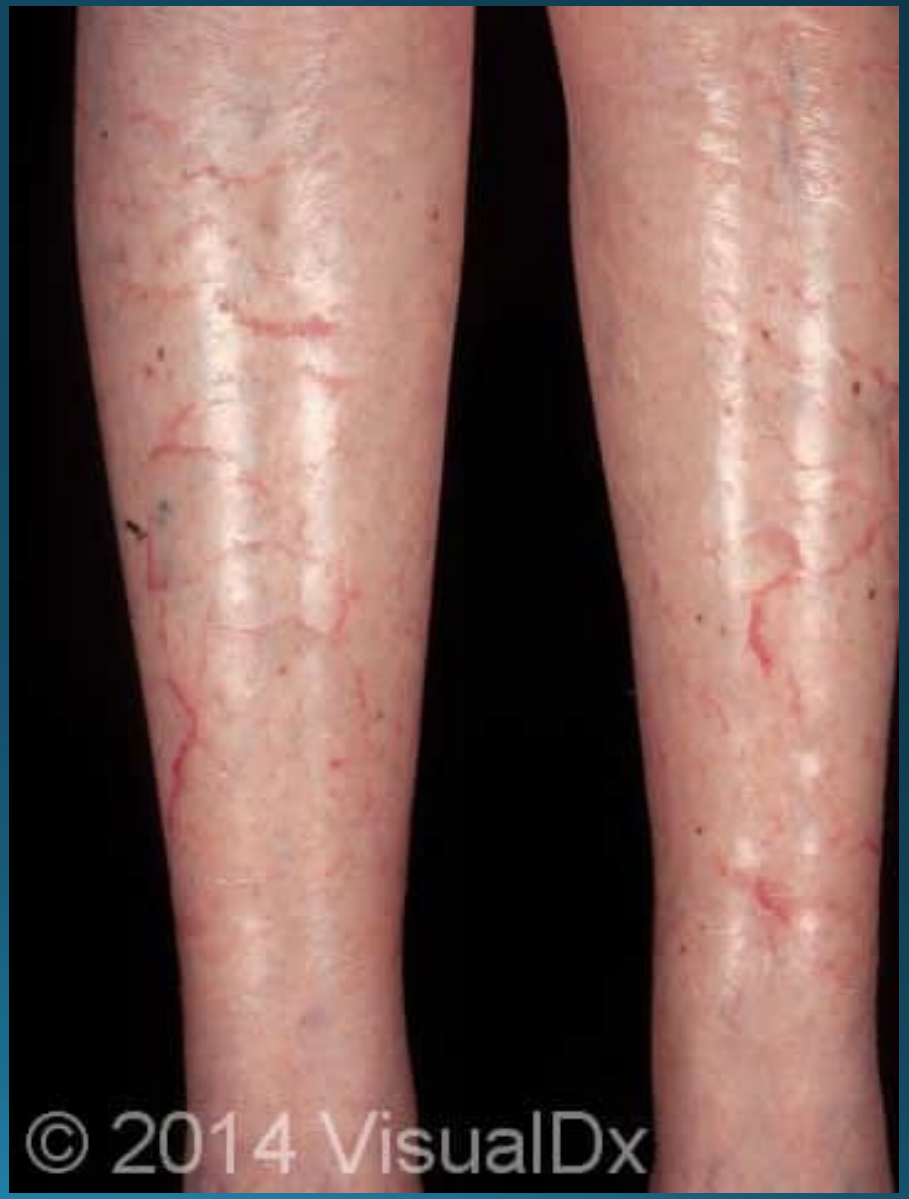
Wikipedia

Dermatologic conditions affecting older patients

Diminished skin barrier and wound healing:

- Purpura
- Skin tears
- Xerosis
- Pruritus
- Eczematous dermatitis
- Pressure ulcers



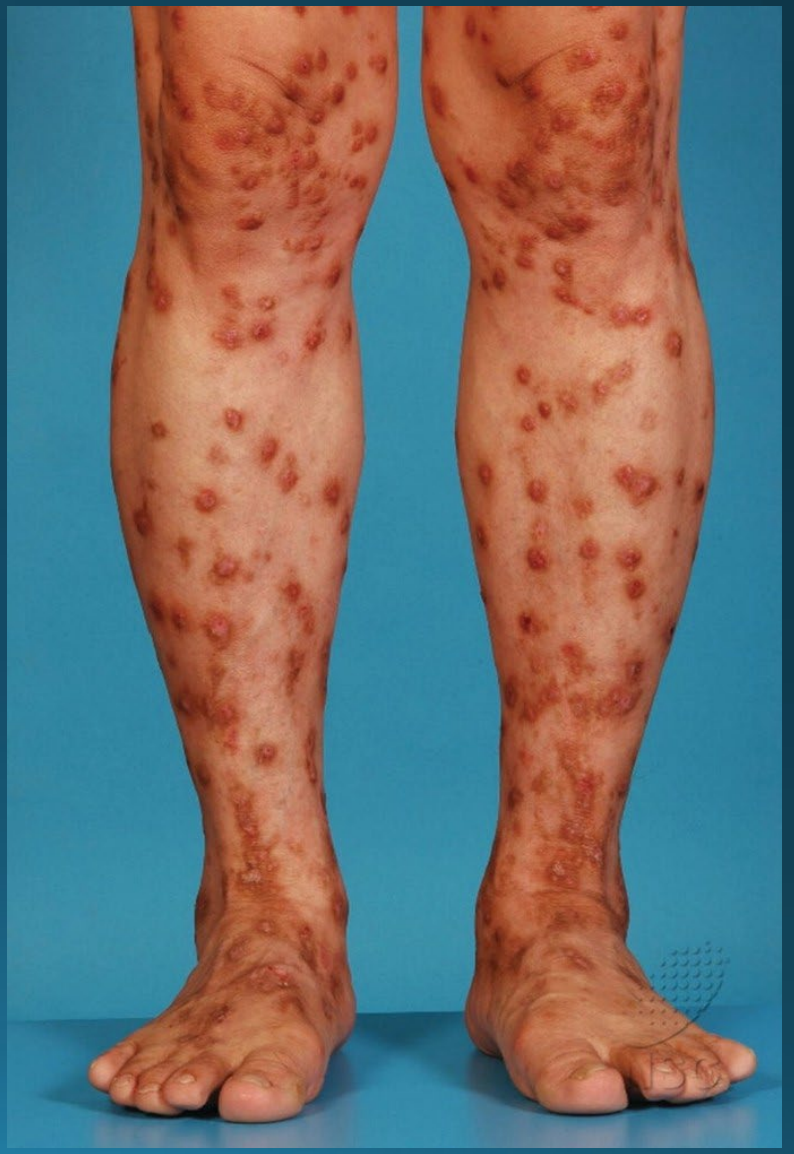


J Clin Aesthet Dermatol. 2018;11(1):13–18

Dermatologic conditions affecting older patients

Neuropsychiatric:

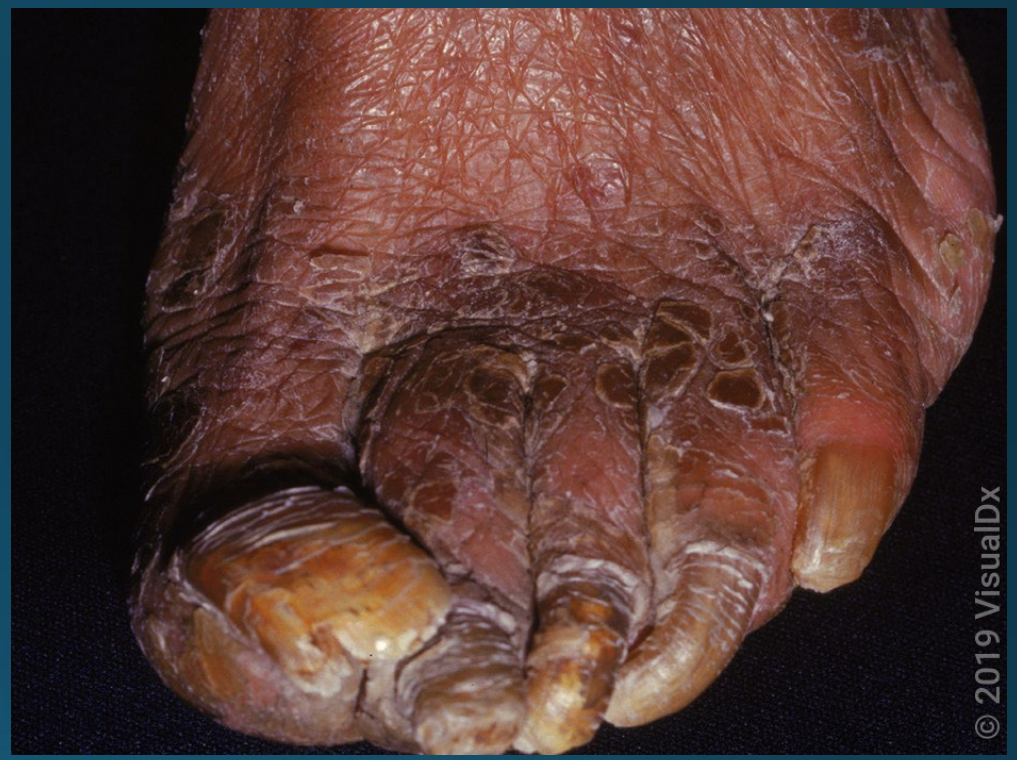
- Lichen simplex chronicus
- Prurigo nodularis
- Delusions of parasitosis

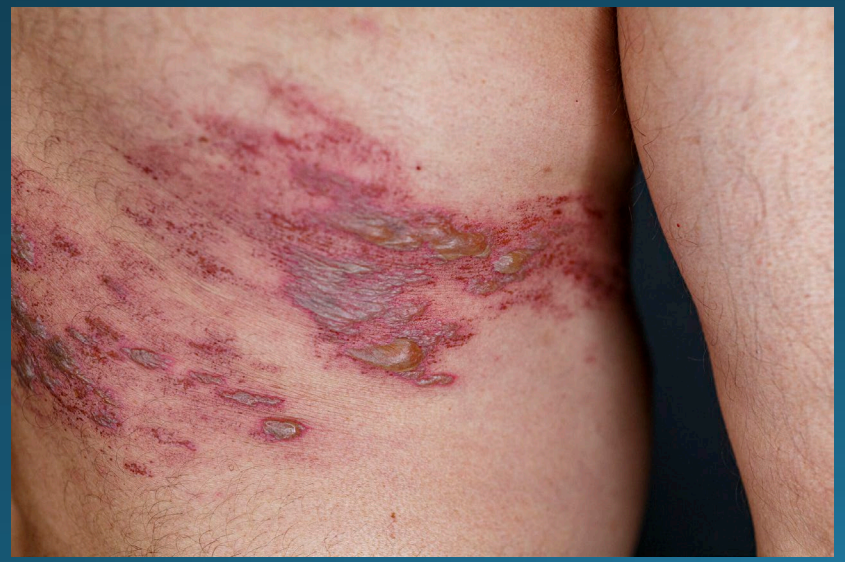


Dermatologic conditions affecting older patients

Infections:

- Tinea pedis/onychomycosis
- Candidiasis
- Zoster and post herpetic neuralgia
- Scabies



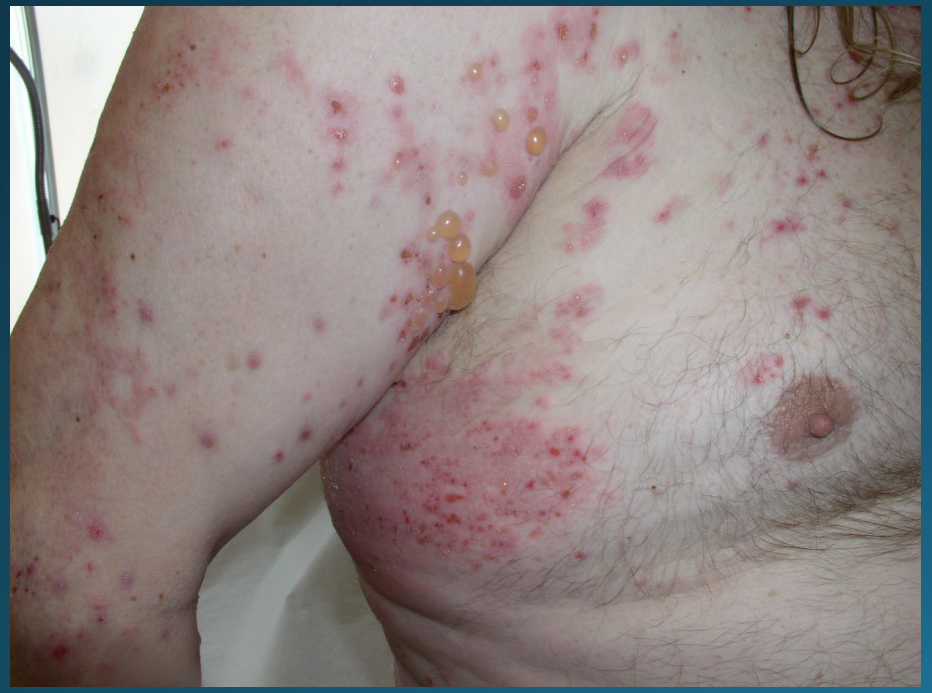


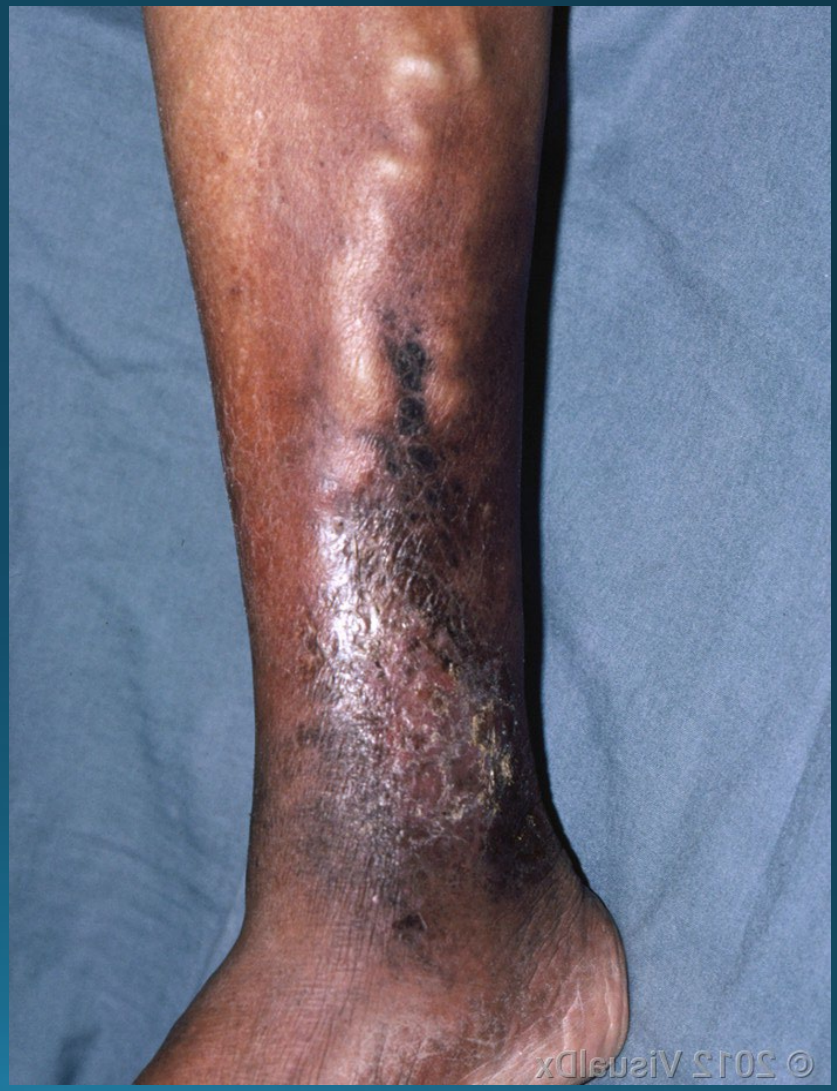
Infectiousdiseaseadvisor.com

Dermatologic conditions affecting older patients

Inflammatory disorders:

- Bullous pemphigoid
- Stasis dermatitis
- Eczematous dermatitis





Visual Dx

Dermatologic conditions affecting older patients

Neoplasms:

- Basal cell carcinoma
- Squamous cell carcinoma
- Melanoma
- Seborrheic keratoses
- Lentigines
- Sebaceous hyperplasia


Zay Nyi Nyi Shutterstock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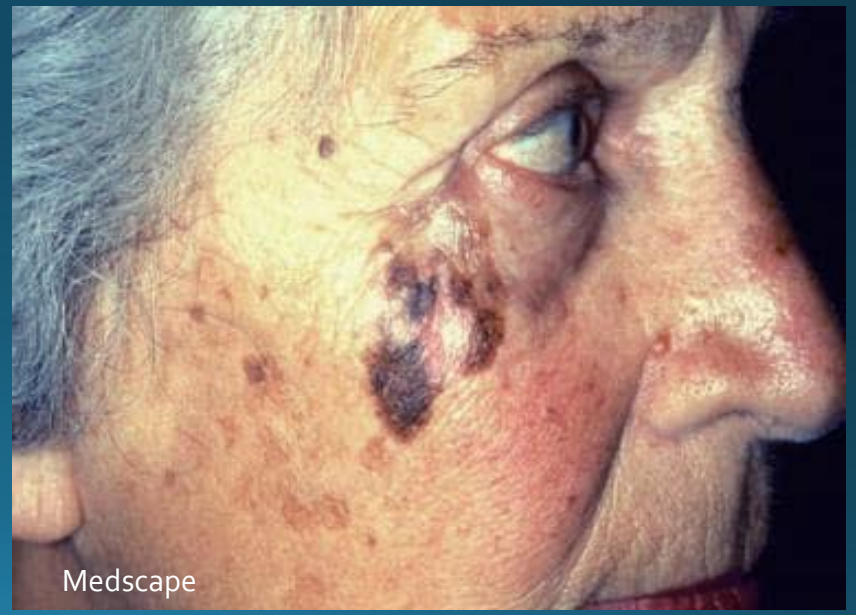
Medscape

Approach to the older patient

From Daniel Butler of Banner Health, formerly of the Geriatric Dermatology Clinic at UCSF:

- Be patient
- Take pressure off initial visit by scheduling close follow ups
- Reconsider everything at each visit
- Communicate uncertainty if you don't know diagnosis at first
- Shared decision making, for example, about whether to escalate therapy or perform a procedure (not all skin cancer has to be treated or treated with a procedure)
- Reframing outcome measures (prioritization of quality of life over cure)

References

Justin O. Endo, Jillian W. Wong, Robert A. Norman, Anne Lynn S. Chang, Geriatric dermatology: Part I. Geriatric pharmacology for the dermatologist, Journal of the American Academy of Dermatology, Volume 68, Issue 4,2013, Pages 521.e1-521.e10, ISSN 0190-9622, https://doi.org/10.1016/j.jaad.2012.10.063.

Anne Lynn S. Chang, Jillian W. Wong, Justin O. Endo, Robert A. Norman, Geriatric Dermatology Review: Major Changes in Skin Function in Older Patients and Their Contribution to Common Clinical Challenges, Journal of the American Medical Directors Association, Volume 14, Issue 10, 2013, Pages 724-730,ISSN 1525-8610, https://doi.org/10.1016/j.jamda.2013.02.014.

Garcovich S, Colloca G, Sollena P, Andrea B, Balducci L, Cho WC, Bernabei R, Peris K. Skin Cancer Epidemics in the Elderly as An Emerging Issue in Geriatric Oncology. Aging Dis. 2017 Oct 1;8(5):643-661. doi: 10.14336/AD.2017.0503. PMID: 28966807; PMCID: PMC5614327.

Norman, R.A. (2003), Geriatric dermatology. Dermatologic Therapy, 16: 260-268. https://doi.org/10.1046/j.1529-8019.2003.01636.x

Linos E, Chren MM, Covinsky K. Geriatric Dermatology—A Framework for Caring for Older Patients With Skin Disease. *JAMA Dermatol.* 2018;154(7):757-758. doi:10.1001/jamadermatol.2018.0286

Demian Fontanella, Jane M. Grant-Kels, Trupal Patel, Robert Norman, Ethical issues in geriatric dermatology, Clinics in Dermatology, Volume 30, Issue 5, 2012, Pages 511-515, ISSN 0738-081X, https://doi.org/10.1016/j.clindermatol.2011.06.021.

Madison Grinnell, BA, Kyla N. Price, BS, Amit Shah, MD, and Daniel C. Butler, MD. Antihistamine safety in older adult dermatologic patients. JAAD 87(2): 381-386.

Thank you, UVA!

My wonderful faculty mentors Kenny Greer, Barbara Wilson, Peyton Weary, Ted Parlette, John Hendrix, Jim Patterson, Joe English

Thank you, UVA!

My residency colleagues Julie Padgett, Lee Dittrich, Wendy Wilson, Scott Van Loock, and Lew Kirkegaard, Rich Murphy, Keith Knoell, Rebecca Rudd, and Todd Colonna