



Self-Care Methods of Adulthood Atopic Dermatitis

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Abstract

The purpose of the action-based bachelor's thesis was to assemble evidence-based guide leaflet about self-care methods of adulthood atopic dermatitis. Partner who commissioned the guide is Vantaa and Kerava Allergy and Asthma Union. The aim is to provide evidence-based information of different self-care methods of adulthood atopic dermatitis.

According to the statistics, approximately 30 % of the Finnish population suffers from atopic dermatitis in one point of their lives. Adulthood atopic dermatitis is more common in Finland, than any other country. Abreast information about the self-care methods do not reach to every basic health center. Lack of knowledge is one of the reasons why the prevention of atopic skin symptoms is not good enough. This can lead prolongation of getting the right treatment, and disease to get more severe. Adulthood atopic dermatitis starts at age 14 and continues to age 70. Typical for adulthood atopic dermatitis symptoms are located in upper body parts like back, face, neck and nape region. Flexures and hands are also typical part where eczema is located. Atopic eczema differs from normal eczema because disease is chronic. Symptoms include thickening of epidermis, scabs and small wounds that are caused because of dry skin. This causes infection gate for general bacteria that can lead to cycle of inflammation. Patients also have higher risk of other infectious diseases. Effective self-care methods are good way to prevent dry skin and the inflammation on the skin. Preventive methods in addition, can reduce the risk of sleep disturbance and stress. The symptoms, caused by atopic dermatitis, can be one reason of higher percentage of mental illnesses. Among the patient diagnosed with atopic dermatitis there are connective factors in pathophysiology. However, the specific cause of atopic dermatitis has not been found.

The research method used in this thesis is an action research. The outcome, the self-care guide is intended to serve the needs of people who have adulthood atopic dermatitis. The purpose of self-care guide leaflet is to give information in easy and short format, where the evidence-based self-care methods are assembled together.

Keywords: atopic dermatitis, eczema, adulthood, self-care

Tiivistelmä

Toiminnallisen opinnäytetyön tarkoituksena oli luoda näyttöön perustuva opaslehti aikuisen atooppisen ihottuman itsehoitomenetelmistä. Oppaan tilaajana ja opinnäytetyön yhteistyökumppanina toimii Vantaan ja Keravan allergia- ja astmaliitto. Oppaan tavoite on tarjota itsehoitomenetelmiä, joita aikuiset potilaat, joilla on atooppinen ihottuma, voivat käyttää.

Tilastojen mukaan noin 30 % suomalaisista kärsii atooppisesta ihottumasta elämänsä aikana. Aikuisten atooppinen dermatiitti on yleisempää Suomessa kuin missään muussa maassa. Ajan tasalla oleva tieto omahoitomenetelmistä ei ulotu jokaiselle perusterveydenhuollon ammattilaiselle. Tiedon puute on yksi syy siihen, miksi atooppisen ihon oireiden ennaltaehkäiseminen ei ole toteutunut riittävän hyvin. Tämä voi johtaa pitkittymiseen hoidon saamisessa, jolloin potilas saattaa jo tarvita erikoissairaanhoidon. Aikuisiän atooppiseksi ihoksi kutsutaan atooppista ihoa, jonka oireet esiintyvät neljäntoista ja seitsemänkymmenen ikävuoden välillä. Aikuisten atooppisen ihottuman tyypilliset oireet sijoittuvat ylävartalon osiin, selän, kasvojen, kaulan ja niskan alueelle. Atooppinen ekseema poikkeaa normaalista ekseemasta siten, että atooppinen ekseema on krooninen. Oireita ovat ihon kuivumisen aiheuttama ihon pintakerroksen paksuuntuminen, ruvet ja pienet haavat. Tämä aiheuttaa infektioportin yleisille bakteereille joita on normaalisti ihon pinnalla. Potilailta tästä syystä myös suurempi riski saada muita tartuntatauteja. Ihon kuivuminen ja bakteerien aiheuttama tulehdus jatkuvat kierteenä, jos hoitomenetelmiä ei tehdä tulehduksen pysäyttämiseksi. Tehokkaat itsehoitomenetelmät ovat hyvä tapa ehkäistä kuivaa ihoa ja siten ihon tulehdusreaktioita. Ennaltaehkäisymenetelmät vähentävät myös unihäiriöiden ja stressin riskiä. Näiden atooppisen ihottuman aiheuttamien oireiden on katsottu olevan yksi syy siihen, miksi atooppista ihoa sairastavilla on enemmän mielenterveysongelmia. Patofysiologiassa on yhteneväisyyksiä ihmisillä, joilla on atooppisen ihon diagnoosi. Selkeää oireiden aiheuttajaa ei kuitenkaan ole pystytty määrittämään.

Opinnäytetyössä on käytetty toiminnallista tutkimusmenetelmää. Työn tulos on itsehoito-opas, joka on tarkoitettu palvelemaan aikuisia, jotka sairastavat atooppista ihottumaa. Itsehoito-opaan tarkoituksena on antaa tietoa ymmärrettävässä ja lyhyessä muodossa. Oppaassa on koottuna tutkimuksiin perustuvaa tietoa itsehoitomenetelmistä ja niiden oikeanlaisesta käytöstä.

Avainsanat: atooppinen dermatiitti, ekseema, aikuisikä, itsehoito

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1 Introduction

The topic, self-treatment of adulthood atopic skin, was chosen, because of authors own experience about difficulty to find help, according to right treatment and care for adulthood atopic dermatitis. In addition, according to studies, even nursing staff or pharmacists do not have sufficient or correct knowledge to treat and instruct a patient suffering from atopic dermatitis (Blaszczynski et al 2016; Kiiski 2018; Kouotou et al 2017.) In the research Blaszczynski et al (2016) the study tested the knowledge of pharmacists in the use of topical corticosteroids. According to the study of Blaszczynski et al (2016), pharmacists instructed patients to treat atopic skin unnecessarily careful according to use of topical corticosteroids. In a study of Kouotou et al (2017), there were found clear shortcomings in the treatment of adulthood atopic dermatitis.

The challenge for the patient is to receive proper treatment for adulthood atopic dermatitis only in special medical care. Doctors who specialize in skin diseases handle most treatment instructions; instructions do not reach basic health care. This causes a prolongation of getting the right treatment. (Eichenfield et al 2015.)

Furthermore, doctors have insufficient time to educate patients about how to apply topical treatments. This affects that patient do not follow instructions, because the patients do not have gotten introduction to the instructions. One of the main reasons of worsening skin condition is that the treatment is not in use. Support groups and organizations are taken part of educating patients and providing helpful literature (Wollenberg et al 2018). Simply managing acute skin inflammations and symptoms of atopic skin is not enough for effective care. Supporting patient with coping and preventable methods supports long-term treatment of atopic dermatitis. Patient responsibility upon effective care management is important. With right knowledge and interventions, the effective self-care methods can be implemented in daily routines. (Holm, Esmann & Jemec 2005.)

Stress has a clear connection to atopic skin inflammation. Stress and anxiety increase the weakness in skin penetration. When immune response is weakened, there is high risk of continuous inflammation cycle. Patients with atopic skin therefore have a higher risk of infection such as staphylococcus, HSV infection, H1N1 influenza, molluscum contagiosum and HPV infection. Atopic skin inflammation affects also on the other parts of the body other than the skin. For example, rheumatoid arthritis, inflammation of the intestines, alopecia and increased risk of skin cancer. Atopic dermatitis increases the risk of multiple mental illnesses. The risk may have increased due to the fact that the normal sleep rhythm may be disturbed because of the symptoms of inflamed atopic skin. (Kiiski 2018.)

The symptoms of atopic dermatitis also affect the patient's appearance. Adulthood atopic dermatitis is common on the face and eyelids, making it a visible and appearance affecting. Rashes in other parts of the body may also be an embarrassing problem. Because of this, atopic dermatitis poses challenges to the patient's social life. The struggle with exterior pressures can cause stress and anxiety that aggravates skin condition. This, together with physical symptoms, affects the overall well-being of the individual. (Wittokowski et al 2014.)

Based on the own analysis it is important to have atopic dermatitis diagnosis and to get the right treatment to avoid skin condition to get worse. Kiiski (2018) explains in his study that atopic dermatitis effects financially on individual life because of the medical costs. Effects on reduced productivity are causing costs for the society. In relative to US costs of atopic dermatitis Finland is indicated to pay roughly 50 million euros because of Atopic dermatitis. Adult patients are more than suspected. Therefore, the prevention of atopic dermatitis skin inflammation and the knowledge of the medical treatment is important.

In this thesis, the effective and evidence-based methods to implement the self-care of adulthood atopic dermatitis, were assembled together. Based on that evidence-based information the authors created and produced a guide leaflet for use of Vantaa and Kerava Allergy and Asthma union. In the thesis and guide leaflet, the methods that have been found ineffective but are still used by patients who are suffering from adulthood atopic dermatitis, have been limited out of this thesis. When talking about the adulthood atopic dermatitis, there must be to be remembered, that every individual is different, and some treatments work better for the others.

2 Atopic Dermatitis

Adulthood atopic dermatitis is more common among the population in Finland than anywhere else in the world. Almost 30 % of Finnish population suffers with atopic dermatitis in one point of their lives. This makes the adulthood atopic dermatitis a major public health problem. Atopic skin negatively affects the quality of life of an individual, both physically and psychologically. Worsening of ability to work is common when the skin is inflamed. Effects of adulthood atopic dermatitis are not only limited on individual but family members and society too. (Kiiski 2018.)

Atopic dermatitis is a skin inflammation disease that usually starts in early childhood. Typical for the disease is seasonal burst caused by multiple factors that also vary with individuals. When children get older disease typically calms down or inflammation goes to different area or even goes away in teenage years. Often atopic inflammation relapses when entering the adulthood. Type, area and severity of this disease varies with individuals and can change at different ages. Other autoimmune diseases are also associated with atopic skin. Usually allergic rhinitis, asthma and food allergies go hand in hand with atopic skin. Symptoms of atopic

dermatitis are different from normal eczema. In atopic dermatitis the skin surface layer, or epidermis, may become thicker, scabs and small wounds are common. This is causing infection gate for general bacteria that cause a chronic inflammatory reaction. (Hannuksela-Svahn 2014.)

Inflammation weakens the performance of the penetration barrier causing a circle of chronic inflammation of the skin, which usually does break out when skin is dry. This leads to easier penetration of inflammation caused bacteria and viruses and also other irritants and allergens (Figure 1). Without effective treatment of inflammation cycle does not usually stop. (Ihotautitalo.fi n.d..)

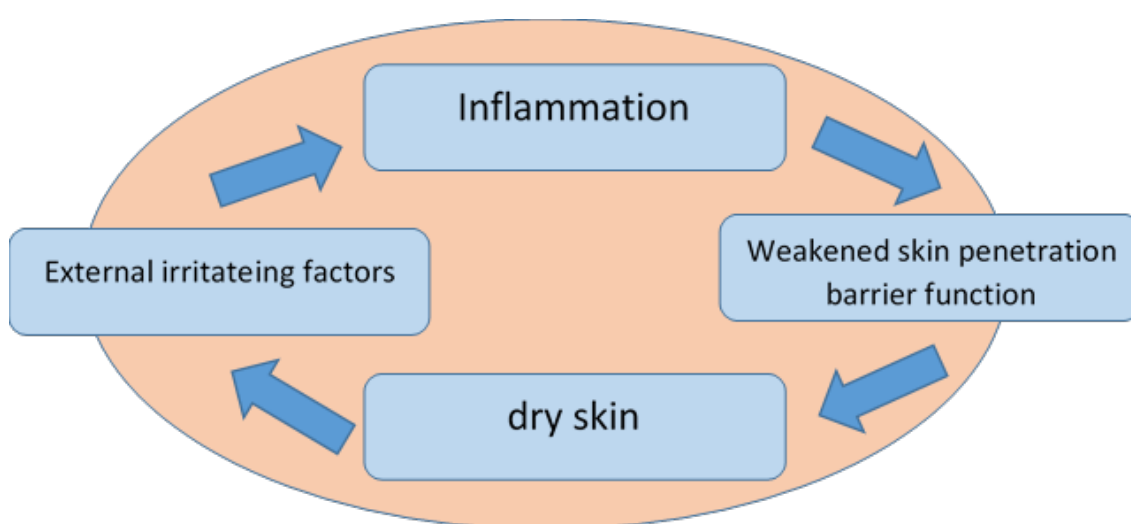


Figure 1: Circle of inflammation with atopic dermatitis (2019)

2.1 Adulthood Atopic Dermatitis

Adulthood atopic dermatitis starts when child is over fourteen. Typical is, that symptoms in the upper part of the body come more dominant: back, face, neck and nape region. Eczema in flexures that is typical for infant and child eczema stays dominant also in adulthood. Atopic hand eczema is another typical symptom that often stays and can worsen at adulthood. Hands are most often in touch of different irritants causing worsening of symptoms. Atopic eye symptoms typically start at adulthood. Atopic blepharitis is disorder that is closely linked to adulthood atopic dermatitis. Atopic blepharitis is located in eyelids and periorbital skin causing eczema symptoms in the eyelid. Swelling, scaling, and intense itch leading to rubbing of the eyes are common and appearance-affecting factor. Atopic keratoconjunctivitis atopic eye disease that affects in the eye both cornea and conjunctiva. Symptoms include increased tearing, vision problems, itch and risk of impaired vision. Together these two are called Atopic blepharoconjunctivitis. (Kiiski 2018.)

Adulthood onset with atopic dermatitis is 20-40 % from all adults that have suffered atopic dermatitis in the childhood. Relapse of atopic skin can happen after years without symptoms. Previous percentage amount can also be due forgetting childhood symptoms. Adulthood atopic dermatitis continues until age 70 is reached. After that disease is classified to be elderly atopic dermatitis. (Kiiski 2018.)



Figure 2: Symptoms of adulthood atopic dermatitis in the upper part of the body (Selinmaa. 2019)

2.2 Pathophysiology and Diagnosis of Atopic Dermatitis

Diagnosing Atopic dermatitis can be problematic because there have not been found specific diagnostic criteria. It is known that atopic dermatitis has strong hereditary influence. Typical is that person suffering from atopic dermatitis has higher levels of immunoglobulin E (IgE) in serum. (Wollenberg et al 2018.) According Kiiski's (2018) study, approximately 80 % of patients have higher levels of IgE. Kiiski also explains that main function of immunoglobulin E is to defend body against helminths venoms and toxins and promotion of lymphocyte T 2 helper cells. This however cannot determine atopic dermatitis, because there is also group of individuals that do not have elevated IgE levels. Other connective factor in pathophysiology is an immune difference towards the T helper 2 cell (Th2), this can be linked to higher IgE levels. Increased mediation production due deviation in the path of Th2 production causing weakened immune system has been found to be one of the reasons of dry skin.

Epidermis of atopic skin is failing to produce enough filaggrin. Filaggrin is protein that is one of the structure pieces of epidermis. Lipid metabolism of patient suffering from atopic dermatitis is decreased. Symptoms caused by complex mechanism, that do not have same explanatory factor cause skin to have increased risk of inflammation through affected dry skin area. (Wollenberg et al 2018.)

According to Watkins (2012) the most important factor of diagnostic criteria with atopic dermatitis, is patient complaining of itching and scratching of skin areas. In addition to itching, there should appear at least three more factors to make the diagnosis. These factors are genetic exposure from other relatives, dry skin and clear signs of eczema, history of scratching of typical area of atopic eczema and history of eczema during the first two years of life.

2.3 Disease Severity Scale and Measurement

Severity of atopic skin can be determined by looking at visible symptoms, i.e. the skin. Overall picture is not only the skin but also patient's own subjective experiences of the disease that also needs to be taken into account. Other subjective symptoms can be sleep disturbance and itching. European Task Force of Atopic Dermatitis has developed scale of measuring severity of atopic skin called SCORAD it stands for Scoring for Atopic Dermatitis. SCORAD measures the severity of atopic eczema, both measuring the amount of epidermis area affected of eczema and subjective experiences of itching and sleep disturbance. Atopic Dermatitis severity can be divided into 4 different groups with SCORAD scale: severe, moderate, mild and baseline. Most patients are suffering from mild eczema. There is still approximately 10 % of people suffering from severe eczema and it seems to be more common in adulthood population. Severe atopic eczema can in the worst-case lead also in hospitalization. (Wollenberg et al 2018.)

3 Self-Care

Self-care as a concept that has many definitions due consensual difficulties. Concept is broad but most often used when there is case of chronic disease or lifestyle. Meaning of the term contains both ability to understand care methods and perform activity that improves and maintains health. In self-care responsibility is on the individual's shoulders to proceed decisions and make action based on them. Self-care can be understood as an independence of the management of the disease. In health care, self-care education is done to fill the needs of the patient. Patients have defined self-care with concepts like: taking care, having control over the treatment and body listening. Desired outcomes of self-care are described to increase satisfaction, lower healthcare costs, improve coping methods, improve feeling of control of the symptoms and decrease health care service needs and well-being. (Richard & Shea 2011.)

4 Treatment of Adulthood Atopic Dermatitis

The individuality of the disease poses challenges to its management. Often an individual suffering from adulthood atopic dermatitis needs to experiment with a variety of treatment methods before finding out the ones, which are effective. It is important that the symptoms and treatment of adulthood atopic dermatitis will be taken seriously and that the individuality of the disease could be taken into account in the treatment. Therefore, there cannot be shown one specific method that will work to every single individual. (Kiiski 2018.)

Treatment of atopic dermatitis is generally similar to childhood atopic dermatitis. Skin care methods including topical ointments and identifying triggers causing skin irritation is the base of first line therapy. Topical corticosteroids belong to first line therapy because effective impact of multiple factors that make the disease easier to cope with. Anti-inflammatory, immunosuppressive, antiproliferative and vasoconstrictive effects on corticosteroids reduce itching and therefore scratching. Healing effect on ongoing inflammation reduces visible eczema and therefore helps maintaining quality of life. Adult atopic dermatitis has complicated psycho-neuroimmunological interactions that are one reason of worsening of the symptoms and creates cycle. Effective stress relieving is therefore good preventing and treatment method of atopic dermatitis. (Kanwar 2016.)

Patients that have mild or seasonal trigger caused eczema, have often good maintenance results with basic management therapy. Normally with regimen therapy of topical anti-inflammatory creams. Basic management includes skin care routine with basic moisturizer, antiseptic measures (bath, shower) and trigger avoidance. Patients whose skin is relapsing continually back to inflammation need to consider more effective treatment methods. Disease severity is then considered moderate or severe. Moderate and Severe atopic dermatitis management therapy includes basic management together with maintenance therapy. Maintenance therapy means implementing anti-inflammatory cream in the areas that typically flare up, two times a week. Acute inflammation is always treated with anti-inflammatory creams. (Eichenfield et al 2015.)

Potency and form of substance is depending on where topical treatment is implemented and how severe the eczema is. Moisturizing ointment use should be increased when the skin is dry. This is done to reduce inflammation that causes patches of red itching inflamed tissue. When inflammation is ongoing, taking care of hygiene with daily showering or bathing is important to reduce microbes causing inflammation in the skin. Topical treatment is implemented right after the shower. (Suomalaisen Lääkäriseuran Duodecimin, Suomen Yleislääketieteen yhdistyksen, Suomen Ihotauti-lääkäriyhdistyksen, Atopialiiton ja Iholiiton asettama työryhmä 2016.)

Basic moisturizing ointments and ointments that have medicinal effect are not used together in the same skin area. One-hour break is needed after implementing topical solutions treating the inflammation. After the break, moisturizer can be implemented. Topical inflammation treating ointments should be left on the skin for ten hours before washing it off. (Suomalaisen Lääkäriseuran Duodecimin, Suomen Yleislääketieteen yhdistyksen, Suomen Ihotautilääkäriyhdistyksen, Atopialiiton ja Iholiiton asettama työryhmä 2016.)

Topical treatment is used against dry skin that is main reason for other symptoms to occur. Moisturizing is done mechanically with agents that soften the skin, form a protective surface that prevents water loss from the skin or humectants that are great to keep moisturized skin. Symptoms of itching, redness of the skin, small wounds and thickening of the skin due excessive scratching. Moisturizers can be only treatment method in milder forms of atopic dermatitis but anti-inflammatory topical agents are necessary in moderate and severe atopic eczema. Use of basic moisturizers as a prevention method reduce disease severity. Seeking professional help is then reduced. Inflammation is treated with anti-inflammatory therapy with topical corticosteroids or topical calcineurin inhibitors. Prevention of highly recurrence flaring can also be done with these agents. (Eichenfield et al 2015.)

4.1 Moisturizing Ointments

Moisturizing atopic skin is the base of effective treatment. Atopic skin is not containing normal lipids protecting the skin surface. This causes increasing water loss from the skin. Ointments are most effective way of preventing irritated, dry and cracked skin. If skin is dry and cracked, there is straight route to different bacteria that cause inflammation on the skin. Prevention of this starts at effective moisturizing. Ointments are most effective after shower. All patients suffering skin disease that reduces skin barrier function benefit products with minimum amount or none preservatives, irritants or fragrances. More important is that the product is suitable for the individual's skin and used on daily basis. Today's ointment selection is comprehensive, lipid percentage and formula can be chosen by patient acceptance. This often requires testing of different basic ointments from different brands. (Beltrani 1999.)

Topical ointments that do not have active inflammation reducing potency are used when skin is dry, but not inflamed. Preventing dryness helps reducing the risk of inflammation. When skin is inflamed basic creams are poorly tolerated on the skin. This is why inflammation should be treated first, with topical solutions that are treating inflammation. Maintain therapy for dry skin is following at least twice a day application of basic cream. Amount of basic cream use per week is minimum 250 g and up to 500 g for adults from mild to severe atopic dermatitis. Whole body is treated with moisturizing ointments as a maintenance therapy for twice a day. (Wollenberg et al 2018.)

Ingredients of the basic moisturizers vary, as well as lipid percentage. Categorization of ointments is done by calculating the lipid percentage. Gel based ointments have none or little lipid percentage and base is water. Lotions have 20 % of lipid and emulsions have 30-40 % of lipid. There are also ointments that have up to 60 % and 70 % of lipid, these ointments ingredients often include petroleum jelly, lanolin or paraffin wax. In the Finnish pharmacy there are also options that have ingredients added to improve effectiveness. Ceramides resemble lipids that body normally produces. Urea is a humectant, and liposomes hydrate skin. The less lipid there is in the ointment the more there is preservatives and emulsifiers that can irritate sensitive skin. Generally accepted treatment recommendations, which have not studied enough but are used in practice show that base and lipid percentage of the ointment is depending of the skin area that is treated. In daytime use and acute phase of the eczema more emulsion-based or gel-based ointments are preferred. Night time and if the skin is dry more lipid-based ointment is suitable. Also, seasonal change can be a reason to change ointment, skin is drying more in cold climate. Greasier ointment is better when skin is more dry. When implementing the ointment, the direction is along the hair, this is to prevent inflammation of the hair follicle. (Hannula-Törrönen 2007.)

4.2 Topical Corticosteroids

Kiiski (2018) brings up the lack of research of some parts of topical ointments that prevent and treat inflammation. Topical corticosteroids have been used since 1950s and have been found to be effective and safe when used properly. However, the dose, frequency and quantity data is limited.

For topical corticosteroids there are many with different formulation, potency and concentration. Topical corticosteroids can be divided in four different groups: mild, medium strong, strong and very strong according the potency. Mild ointments are often used to mild inflammation or when skin is thin and sensitive. Other corticosteroid groups are prescribed according severity of eczema and thickness of the skin. Different ointment bases and solutions are available depending on what part of the skin is treated. Dry scaling skin needs more lipid content cream whereas more damp and leaking skin needs more emulsion-based cream. Atopic inflammation can also be in the hairy parts of the body where creams are uncomfortable to implement. Liquid base solution of corticosteroid is the best alternative when implementing treatment in hairy parts of the body. (Ihotautitalo.fi n.d.)

Treatment of face eczema should be treated only with group mild corticosteroids. Most effective way of avoiding side effects like skin thinning is using them purposefully and according manual. When inflammation is treated correctly, and maintenance therapy is followed, after regimen, relapses of flaring are reduced. (Wollenberg et al 2018.)

Use of topical corticosteroids method is based on everyday care. Topical corticosteroids are first therapy method of active inflammation of atopic skin. Single daily application has been found as effective as twice a day, at least, when the corticosteroid is potent (Medium strong to very strong). Maintenance treatment has been found effective and reducing flares when topical corticosteroids are used twice in a week (Kiiski 2018.) Amount of implementing topical corticosteroid use is not determined, but generally accepted norm is the fingertip unit. Corticosteroid ointment is measured from the top of the index ringer to a first joint. This amount is approximately 0,5 g. It is enough for two adult palms. (Eichenfield et al 2014.)

4.3 Tacrolimus and Pimecrolimus

Topical calcineurin inhibitors, tacrolimus and pimecrolimus are treatment methods that has been shown to have effective impact on inflamed atopic skin. Calcineurin inhibitors have been available in Finland since 2002. The calcineurin inhibitor ointments have been found effective and safe in the studies. (Reitamo & Remitz 2003.)

These creams are used together with corticosteroids or with individuals who have not benefited corticosteroid treatment. Topical calcineurin inhibitors are better for sensitive or thin skin like face and eyelids. Calcineurin inhibitors do not have skin thinning side effect so it is better alternative for skin areas that are already thin. Most common side effects on tacrolimus and pimecrolimus are burning, stinging and pruritus when implementing ointment in the area that is inflamed. These side effects will mitigate when continuing the treatment. Pain management of acetylsalicylic acid has shown to reduce these side effects, but more studies with placebo group of patients needs to be done to prove efficacy. (Kiiski 2018.)

The mechanism of action is based on polypeptide that stops calcineurin and T-cell production. This causes inflammation recovery without damaging connective tissue. Treatment can be continued until area that is inflamed is healed completely. Pimecrolimus is found better in milder or moderate forms of atopic dermatitis when tacrolimus is used for patients who suffer moderate to severe eczema. Reason for this is that pimecrolimus has milder impact on calcineurin and T-cell production than tacrolimus. Ointment base is also lighter. (Reitamo & Remitz 2003.)

Topical calcineurin inhibitors methods of use, based on daily care. Topical calcineurin inhibitors are new alternative to topical corticosteroids. Twice daily application to active inflammation of atopic skin until inflammation is healed. Twice in a week as a maintenance therapy has been found effective. Topical calcineurin inhibitors are used often as second line therapy method of inflamed atopic skin. When topical corticosteroids have not been effective or sufficient. (Kiiski 2018.)

4.4 Wet-wrap Therapy

Wet-wrap therapy can be one solution of reducing symptoms of flaring atopic eczema, especially when skin has moderate or severe symptoms. This self-care method is time consuming and can be complicated without clear instructions. Often wet-wrap therapy is used when symptoms of atopic dermatitis are moderate or severe. Instructions should be followed to get the best possible results. Normal care routine with topical ointments should be followed during wet-wrap therapy. (Eichenfield et al 2015.) Efficiency is based on the fact that moist wrapping absorbs irritating factors from the inflamed skin and kills microbes. When wet-wraps are implemented, scratching that is typical for patient suffering from atopic dermatitis is prevented. Positive effects of wet-wraps include softening of the possible scales, soothing the itch and cooling down the surface of the inflamed skin. Solutions that can be used to improve efficacy are: zinc sulfate 0,25 %, aluminisubacetatis 0,5-2 % or sodium chloride 0,9 %. Sodium chloride is a solution that do not need prescription from the doctor. (Koulu 2016.)

Clear Instructions for wet-wrap therapy is essential to perform therapy. First step is to have normal short shower that is preferred for patients suffering from atopic dermatitis. Second step is to implement topical treatment that patient has in daily routine. Clean and wet dressings of cotton gauze or clean cotton fabric are placed right after the shower. Gauze or cotton fabric should be wetted with warm tap water and wrung out to be slightly damp. Two or three layers of wet-wraps are placed on the area that is inflamed and flaring. Wet-wraps are covered with dry layer of cotton or net. Different elastic bandages or tube socks can be used to hold wraps on place. Wet-wraps should be used at least 2-4 hours and then use new wraps if treatment is desired to continue. Finishing with the final step of moisturizing the area that has been wet-wrapped. (Nicol et al 2014.)

5 Other Self-Care Methods and Means

Other Self-care methods and means are treatments that can be used in self-care of adulthood atopic dermatitis, which have been found effective based on studies. Identifying triggers, clothing, bathing, climate effects, psychological factors and self-education, were found in the studies. Limitation was done by identifying methods and means that can't be done by oneself.

5.1 Identifying Triggers

Atopic dermatitis can flare up from environmental factors. Environmental factors cannot be generalized, because the influencing factors and their impact are individual. It is important to identify the triggers so that it is easy to reduce them and prevent flaring. Often these triggers can be skin irritants, like strong substances, food, temperature and humidity. (Thomas 2008.) Avoidance of the triggers reduces the risk of flaring up and longer periods of remission or sometimes the symptoms may even tail away completely. Multiple environmental factors

and different substances can be irritating for atopic skin. Irritants or triggers can be separated in three groups: mechanical, chemical and biological. Mechanical or physical irritants can be different materials like fabrics that are in contact with the skin. Chemical irritants are substances as solvents or acids. Biological irritants are for example allergens or microbes like dust mites. (Wollenberg et al 2018.)

Finding the specific triggers can be troublesome, but if the matching ones are found avoidance helps reducing flares. In adult cases, allergies are rarely the cause of eczema. Food and environmental allergens can be tested with prick test or patch test. Allergy causes different symptoms and are irrelevant of eczema flaring. (Eichenfield et al 2015.)

5.2 Clothing and Bathing

Skin irritation trigger can also be clothing. Fabrics and fibers that are causing irritation to the skin should be avoided. Smooth clothing, like silk has been found not to irritate atopic skin as much. Wool on the other hand has found to irritate skin more due its rough surface. Heavy and thick clothing can also trigger irritation of the skin because of heating and sweating. (Wollenberg et al 2018.)

Salt baths are recommended to include treatment of atopic dermatitis. Efficacy of saltwater alone has not been proved to have impact on atopic dermatitis, but studies that have examined climate effects on atopic skin introduced better results in seaside climate. Atopic skin should be cleaned carefully. It is important to have skin surface clean and dead skin reduced from the surface of the skin. Duration of the bath or shower should be short and cool rapid rinse after shower is instructed. (Wollenberg et al 2018.) Daily bathing or showering with warm water and detergents that are mild and fragrance free are recommended. After shower or bath, moisturizing emollients are implemented immediately after drying off the skin. This is done to prevent transepidermal water loss from the skin. Moisturizers attach the water inside the skin keeping it protected and flexible. If moisturizers are not implemented right after the shower, water loss from epidermis is increased. This will cause dry and irritated skin. Bathing and shower techniques that are properly used often affect highly in skin condition. (Thomas 2008.)

5.3 Climate and Sunlight Therapy

Wollenberg et al (2018) Explain that most of the patients suffering from atopic eczema notice improvement in the skin condition during the summer season. Therefore, artificial ultra violet radiation is invented to treat atopic dermatitis. There has been found results, that the symptoms of adulthood atopic dermatitis have been reduced or completely disappeared after summer holiday. Oppositely the skin condition with adulthood atopic dermatitis has been reported worsening during the other seasons. This confirms that the seasonal variation of skin

condition depends on the sun. However, there is not reliable evidence of duration of positive effects on skin condition improvement (Heikkilä & Koulu 2016).

According to study of Patrizi et al (2009) about sun exposure effects on atopic dermatitis skin condition improvement was high. Over 70 % of the study group had complete absence of the symptoms after summer holiday. All patients had mild or moderate atopic dermatitis. For the environmental factor, seaside and southern region had the best results on skin condition.

Karppinen et al (2014) proved that ultra violet exposure and heliotherapy has improving effect on skin condition. Test group's skin condition results were examined before and after 2-week heliotherapy. Sunbathing was started with 15 to 30 minutes sessions, without sunscreen and increased to 120 minutes. Study group was also doing exercise like watersports and having group conversations together with psychologists. After two weeks, mean score results showed significant improvement of atopic dermatitis skin condition.

5.4 Psychological and Educational Means in Coping with Atopic Dermatitis

Changes in psychological and emotional health is proven to affect atopic eczema. Impulsive itch-scratch-cycle can be practiced to ease, with self-control. Relaxation techniques, training of socializing, communicating and seeking coping methods are also effective methods of controlling skin condition. Habit reversal techniques and relaxation method is proven to make huge improvement in severity of the disease. (Wollenberg et al 2018.) Sleep disturbance is common symptom of atopic dermatitis, often experienced when the skin is inflamed and itching. Sleep disturbance has been thought to increase risk of mental health problems that are more common in people who have atopic dermatitis. Anxiety disorders, depression and autism spectrum disorders have bigger probability in atopic dermatitis patients who have sleeping problems. (Eichenfield et al 2015.)

Skin development and nervous system are connected in the embryo and is explained to have negative impact on psychosomatic health. This is causing higher risk of stress and emotion sensitiveness when patient has atopic eczema. If requested treatment methods fail, there is one option of trying overcome stress. Methods of reducing stress include meditation, biofeedback, sports, cognitive behavioral methods, hypnosis and progressive relaxation. These techniques can help coping with the stress and that way scratch cycle that is common with patient suffering from atopic dermatitis. (Shenefelt 2010.)

Education, knowledge and support for patients is highly important. Atopic skin management depends on patient involvement. Abreast self-treatment information is essential to provide coping methods. Simply managing acute skin inflammations and symptoms of atopic skin is not enough for effective care. Supporting patient with coping and preventable methods supports long-term treatment of atopic dermatitis. Patient responsibility upon effective care

management is important. With right knowledge and interventions, the effective self-care methods can be implemented in daily routines. (Holm, Esmann & Jemec 2005.)

Variety of therapies and individuality of the disease brings out need of training and education to take responsibility of self-care methods. Education and support should be provided right after diagnosis. Psychological support may be needed because of visible, painful and appearance effecting eczema. Atopic dermatitis can cause deteriorated quality of life and this should be taken into consideration when examining an individual. (Wollenberg et al 2018.)

6 Purpose and Aim

The purpose of the action-based bachelor's thesis was to assemble evidence-based guide leaflet about self-care methods of adulthood atopic dermatitis.

Correct self-care method and implementation has been explained clearly and simple so that every adult that reads the leaflet gets fast information, which is needed for proper care in home settings. With these methods, individual can improve his or her knowledge of daily care routine.

The aim was to provide evidence-based information of different self-care methods of adulthood atopic dermatitis.

This is including how to implement and use different self-care methods adequately. With these assembled self-treatment methods, adults can find an effective and right method for their self-care.

This thesis can be used as a base for treating atopic dermatitis generally, prevent, and relive the symptoms of skin inflammation of atopic dermatitis. The guide leaflet, the finished output from all the information assembled, is produced for Vantaa and Kerava allergy and asthma union. Vantaa and Kerava allergy and asthma union can use the guide leaflet to help and educate the target group, patients with adulthood atopic dermatitis. In addition, this thesis can serve as an educational meaning, as a tool for nursing professionals.

7 Thesis Process

The topic, self-care methods of adulthood atopic dermatitis, was chosen because of authors own experience of difficulty to get help and guidance with self-care of adulthood atopic dermatitis. Vantaa and Kerava allergy and asthma union liked the idea and pledged as a cooperation partner.

In the beginning of the thesis proses the authors implemented an educational event with Vantaa and Kerava allergy and asthma union about the treatment of adulthood atopic dermatitis.

The event was a lecture about the adulthood atopic dermatitis treatment methods. The participants of this educational event, including authors, representative of Vantaa and Kerava allergy and asthma union and audience, expressed a need to assemble abreast information about effective self-care methods of adulthood atopic dermatitis. According to this need the authors with representative of Vantaa and Kerava allergy and asthma union expressed a need for a guide leaflet about self-care methods of adulthood atopic dermatitis.

Thesis writing process was continued as action research with a goal of creating guide leaflet. Leaflet language was decided to be Finnish because majority of Allergy and Asthma association of Vantaa and Kerava customers are native Finnish.

7.1 Action Research and Method of Analysis

This thesis was implemented as an action research thesis. Depending on profession, action research can be a leaflet, instruction, guide or manual. (Vilkka & Airaksinen 2003). The outcome of this thesis was a leaflet with information and instructions for self-care of adulthood atopic dermatitis.

Action research study brings together action, reflection, theory and practice. It addresses issues that are found to be problematic and need change. Aim of action research is to make further development into function and perform of organization. Outcomes of action research serve the needs of the organization. Therefore, cooperating organization should be well known, its aims, function and ways of performing. Process of action research is divided to inquiry process and the implementation process. Reflection can be divided into three categories, content reflection, process reflection and premise reflection. (Coghlan 2019.)

Methodology used the thesis is qualitative. Method was chosen to be best for gathering information from multiple trustworthy sources. Both qualitative and quantitative studies were found to have information about effective self-care methods of adulthood atopic dermatitis. Qualitative method collection was the best solution, because of action research needed multiple sources. Data was needed to have exact and required information. Content analysis of the studies was done to introduce the main points of self-care methods of adulthood atopic dermatitis. Studies were read and information from them was implemented descriptive way to bring information in our thesis. Many studies were found to require payment before accessing it and it limited our studies because lack of money students receive. Study limitation regarding year of publication decided be broad because base of methods of treating atopic dermatitis were found to be almost unchanged in old and new studies. Out dated information was not included in treatment methods if it wasn't the same than in new studies. Limitation of year of publication was decided to be not older than 20 years. More detailed treatment research was done trying to keep studies resent. Articles and studies were searched about the adulthood atopic dermatitis and the treatment methods that can be used in home setting.

Words that were searched were: adulthood, atopic dermatitis, self-care, treatment and methods.

The goal was to assemble in this thesis the self-care methods of adulthood atopic dermatitis that will improve skin condition. Based on that information the authors created and produced a guide leaflet for Vantaa and Kerava allergy and asthma union. The authors searched information that answered to the questions as: "What is self-care information and how to adequately use different self-care treatment possibilities in adulthood atopic dermatitis?" and "How to implement self-care treatments in adulthood atopic dermatitis?". This thesis is not focusing on infant child or elderly types of atopic dermatitis. Even though similarity of treatment is prominent. Methods of self-care that are found ineffective in the studies that were analyzed, have been ruled out of this thesis. The authors used the resources for information from different sources such Duodecim, Terveystalo.fi, Google scholar, EBSCO host and Cinahl.

7.2 Guide

The guide leaflet is prepared for adult patients suffering from Atopic Dermatitis. Patients and their relatives should be able to get reliable information and advice with regard to evidence-based therapeutic modalities. Hyvärinen (2005) wrote in her article, what a functioning patient guide need. Hyvärinen points that the language used in the guide leaflet is simple. The vocabulary is clear and sentences are well structured. This makes the information easily internalized. The reader gets information how to relieve the symptoms of adulthood atopic dermatitis and how to prevent the symptoms getting worse. The guide leaflet uses simple general language instead of difficult professional terminology. With general language, the guide leaflet is easy to understand by everyone.

Kyngäs et al (2007) Pages 124-127 notes that written guidance importance increases when there is limited time to educate a patient. Nowadays time is limited for a certain length of a patient appointment. Written guidance can be read later to orientate to the topic. Material should be intended for patient's needs. Patients need education regarding the matter of concern. Common need is disease education and treatment. Written guide should be easily understandable, if language is too difficult there can be problems of internalize the information. Content and grammar should be understandable and suitable. A complete guide can be reviewed according to contents of the guide, layout, language and structure. Only the most important education matters should be included into the guide, to reduce excessive information. Specific and abreast information that covers up the questions of: what? why? how? when? and where?

7.3 Implementation of the Guide Leaflet

Guide leaflet process started after all the information of self-care methods of atopic dermatitis were assembled. The leaflet was decided to be in electronic form that can be printed out

and modified easily. The electronic leaflet can be sent by e-mail and it does not need to be pre-printed, which can be expensive. Best solution for leaflet design software was searched online. Microsoft Office Word was found out to have brochure making feature. Layouts were easily modified with good tips inserted on the parts where own text was to be implemented. Software was practiced to use and leaflet was decided to be folded in three parts. Best looking layout was divided so and it was decided to be clear solution. Coloring of the leaflet was decided to be blue, calm color that both Laurea and Allergy and asthma union use. Structure was modified to serve the need of the leaflet. Author took the pictures that are used in the leaflet. Permission to use the picture of inflamed skin, was asked from the owner. In the last page of the guide leaflet was informed bachelor's thesis name and authors, so that the source for the guide is known. Also notice of contacting doctor if symptoms are getting worse or there are negative effects on everyday life, was inserted. This was to make sure that reader is contacting doctor if needed.

Front page was decided to be simple with title only. Text was decided to undergo topical treatment methods first, in order of importance. Continuing with other treatment methods. Main points of the methods were included in a customer friendly wording.

7.4 Evaluation of the Guide Leaflet

Text was spell checked by study advisor and sent to working life partner to be evaluated in the beginning of May 2019. Feedback was given from working life partner. Front page layout was instructed to make it more interesting for the customer. Also, in the last thesis seminar proposal of inserting logo of Laurea University of applied sciences revealed. Both picture of hand with a heart drawn by lotion and Laurea logo was inserted in the leaflet as desired. Ready product was sent to three persons that are diagnosed with adulthood atopic dermatitis. They gave feedback about the leaflet informativeness and layout. As a feedback, suggestion of adding the point that if skin stays in stable condition anti-inflammatory ointments might not be needed. Also in a maintenance section there was pointed out that discontinue of maintenance therapy is suggested, if skin is not showing signs of flaring up.

As a final result authors are pleased of the outcome. Overall layout looks nice and attractive. There is enough text to keep reader interested. Instructions are clear and pictures complement the income. Layout is easy to use and it can be modified if needed. For example, language can be translated if needed.

Feedback from working life partner was overall positive. They were contented with the leaflet's layout. They expressed wish about adding the phototherapy to the leaflet and introducing the possibility to use basic cream instead of soap when showering. Phototherapy was excluded because it does not include into self-care methods.

Feedback from the three people that are diagnosed with adulthood atopic dermatitis were good and they commented that text is short and concise and the most important treatment methods are clearly reported.

8 Conclusion, Discussion and Reflection

Action research aim was to provide evidence-based information of different self-care methods of adulthood atopic dermatitis. Action research outcome and purpose was to assemble evidence-based guide leaflet about self-care methods of adulthood atopic dermatitis. Qualitative research was done by analyzing content of multiple articles. Based on the analysis thesis was assembled and guide leaflet was made and submitted to Vantaa and Kerava allergy and asthma union. Information presented in the guide is focusing on evidence-based information that can improve self-care methods of patient suffering from adulthood atopic dermatitis.

Interest in atopic dermatitis lead to informative event where idea of doing guide for the adult patients was coming up. Correct information in customer friendly form was found to be helpful addition. Adulthood type of eczema was chosen because often studies are focusing in childhood type of eczema. Own experience of lacking of informative guidance of how to implement and use topical treatment methods is also one reason for the topic. Vantaa and Kerava allergy and asthma union commissioned the guide for their use. With the help of the guide patient gets the basic information that is sometimes hard to receive. Guide gives fast basic information for practical problems. Guide process went well and Vantaa and Kerava allergy and asthma union was held in contact with face-to-face meetings and via email messages. Development and evaluation was done together to get the best result.

One of the challenges were lack of the studies concerning adulthood type dermatitis and limiting the information to scientifically proven methods of treatment. There were studies that have proven different self-care methods together to be effective. More research is needed to ensure functionality and to determine that particular treatment works. For example, in climate therapy some studies were found significant improvement of the skin condition. However, there were multiple factors that were treating the symptoms and no comparison group were introduced. Using the right concepts and choosing from conflicting information proved to be a challenge. One thing that was also problematic that one of the authors had large knowledge base already of the treatment methods. Studies were not included some of the methods that author thought were already proven to be effective. Understanding that some methods may be hard to prove effective because of test group then should take a break from other methods.

8.1 Ethics and Validity

There are many ethical principles that need to be taken into a consideration when writing a thesis. Thesis needs to be ethically responsible and following research ethics. Authors of the thesis need to adopt research integrity to provide honest content for themselves and others. Research need to follow responsibility and ethical criteria throughout thesis process. Plagiarism is not acceptable, all the used material is used and cited correctly following ethical rules and for respect for other researchers. Research plan, implementation and publication is done according to the requirements. If research permit and contract is needed they are managed adequately. Members of the thesis process all know their responsibilities and follow them. All kinds of fabrication, falsification and plagiarism is against ethical principles. Possible budgeted is reported if there is funding or costs that research requires. (TENK 2012.)

When doing content analysis ethical issues arise. Research is made for further development and information provided needs to be on time and trustworthy. This is why research is done from recourses that are considered safe and reliable. Search for sources were done mostly from Laurea libguides database. Other searches were done from Duodecim käypähoito that provides research based national treatment recommendations. HUS terveystyö data was also used, it is a web service developed together with experts and patients. Everything that is analyzed was needed to be useful and trustworthy. Correct research methodology was needed that right conclusions were made.

The ethics in this thesis has been taken into consideration during the process. Due to nature of this thesis, as the authors are not going to interview or doing a survey, there is no need for a research agreement. We signed an agreement with Allergy and Asthma association of Vantaa and Kerava, regarding the guide leaflet, which has been produced for working-life partner and it is outcome of this thesis.

All the information used in this thesis based on evidence-based information, and all the sources that are used in this thesis are selected from trusted sources. All the used sources are marked correctly according Laurea guidelines of referencing.

8.2 Professional Growth

Authors feel that they are reached their own learning objectives and are both skillful in treating adulthood atopic dermatitis. Academic writing skills were improved during the thesis writing process. Analyzing and finding reliable studies was practiced, knowledge regarding it was increased. During the process authors learned to organize project for an informative event where participants got evidence-based information. Advertising the event in the monthly outgoing publication of Vantaa and Kerava allergy and asthma union paper. Final learning outcome was creating guide leaflet using software system that was unfamiliar for the both authors. Guide leaflet was done based on thesis. During the thesis process plans were changed

for many reasons and adaptability of authors was tested. Stress resilience increased during the thesis process but challenges were overcome. Outcome of the final creation is easy to use and visually appealing. Collaboration with Vantaa and Kerava allergy and asthma union went well even though there were breaks in between the thesis process. Satisfaction with the outcome was on the both sides.

8.3 Usability of the Thesis and Further Research Idea

Vantaa and Kerava allergy and asthma union can use this thesis when operating with adults with atopic dermatitis. Leaflet can also be distributed for other organization members to share basic information that is not known generally. Leaflet is at electronic version and it can be printed out when needed. If there is need to change the content of the leaflet it can be easily modified. Guide could be effective if it would reach the school nurses and basic healthcare so that nurses who work with young adults could give information about preventing and treating the symptoms effectively. It could save resources on specialized health care.

When Authors started doing this thesis there were discussion whether to focus on false or alternative, not evidence-based treatment methods that are in use. There are alternative treatment methods in use that do not have enough research to prove improvement on adulthood atopic dermatitis. Many studies were found to have some self-treatment methods that were found ineffective. There are however so many of alternative treatment methods that, study that searches the most common ones with questionnaire is useful. Based on the data collected from questionnaire there could be study of what kind of methods are used and are they effective or not according to content research done afterwards. This could be good information for the patients who are using alternative, unsettled treatment methods. It is interesting that there are differences in pathophysiology and same explanatory cause of atopic dermatitis have not found. Disease is also highly individual regarding trigger factors and what is found to be best treatment methods.

Atopic skin, stress and mental illnesses were linked together. It would be interesting to gather most effective stress relieving methods, for people with atopic dermatitis. This could also be action research study with a goal of implementing stress relieving day that would explain what exactly are the relaxation and stress relieving methods that have impact as a treatment method.

References

Literature:

Kyngäs, H., Kääriäinen, M., Poskiparta, M., Johansson, K., Hirvonen, E. & Renfors, T. 2007. Ohjaaminen hoitotyössä. Porvoo: WSOY

Vilka, H. & Airaksinen, T. 2003. Toiminnallinen opinnäytetyö. Jyväskylä: Gummerus Kirjapaino Oy.

Electronic Sources:

Blaszczynski, A., Fischer, G., Lee, A. & Smith S. 2016. Pharmacists' knowledge about use of topical corticosteroids in atopic dermatitis: Pre and post continuing professional development education. Accessed 17.4.2018. <https://www.ncbi.nlm.nih.gov/pubmed/25846602>

Beltrani, V. 1999. Managing atopic dermatitis, *Dermatology Nursing* 11(3). Accessed 23.3.2019. <http://search.ebscohost.com.nelli.laurea.fi/login.aspx?direct=true&db=c8h&AN=107202954&site=ehost-live>

Coghlan, D. 2019. *Doing Action Research in Your Own Organization* Fifth edition. Accessed 7.5.2019. https://books.google.fi/books?hl=fi&lr=&id=nMGKDwAAQBAJ&oi=fnd&pg=PP1&dq=info:ygY8cuAsSlwJ:scholar.google.com/&ots=z762fk6Tpk&sig=VYfduP8uas6jBcPKh2KKLcxjM6U&redir_esc=y#v=onepage&q&f=false

Eichenfield, L., Boguniewicz, M., Simpson, E., Russell, J., Block, J., Feldman, S., Clark, A., Tofte, S., Dunn, J. & Paller, A. 2015. Translating Atopic Dermatitis Management Guidelines Into Practice for Primary Care Providers. Accessed 8.5.2019. https://www.researchgate.net/publication/280693201_Translating_Atopic_Dermatitis_Management_Guidelines_Into_Practice_for_Primary_Care_Providers

Eichenfield, L., Wynn, T., Berger, T., Krol, A., Paller, A., Schwarzenberger, K., Bergman, J., Chamlin, S., Cohen, D., Cooper, K., Corodo, K., Davis, D., Feldman, S., Hanfin, J., Margolis, D., Silverman, Simpson, E., Williams, H. & Sidbury, R. 2014. Guidelines of care for the management of atopic dermatitis: Section 2. Management and treatment of atopic dermatitis with topical therapies. *Journal of the American Academy of Dermatology*. Accessed 30.4.2019. <https://www.sciencedirect.com/science/article/pii/S0190962214012572>

Hannuksela-Svahn, A. 2014. Atooppinen ekseema (ihottuma). Lääkärikirja Duodecim. Accessed 8.3.2019. https://www.terveyskirjasto.fi/terveyskirjasto/tk.koti?p_artikkeli=dlk00202

Hannula-Törrönen, J. 2007. Perusvoiteiden käyttö kuivan ja atooppisen ihon hoidossa. Accessed 27.4.2019. <https://www.uef.fi/documents/10975/2103072/HannulaJaana.pdf/>

Heikkilä, H. & Koulu, L. 2016 Ilmastohoito ja atooppinen ekseema. Accessed 24.4.2019. <http://www.kaypahoito.fi/web/kh/suosituksset/suositus?id=nak06705&suositusid=hoi50077>

Holm, E., Esmann, S. & Jemec, G. 2005. Patient education and morbidity in atopic eczema. *Dermatology nursing* 17(1). Accessed 24.03.2019. <http://search.ebscohost.com.nelli.laurea.fi/login.aspx?direct=true&db=c8h&AN=106597021&site=ehost-live>

Hyvärinen, R. 2005. Millainen on toimiva potilasohje? Hyvä kieliasu varmistaa sanoman perillemenon. *Duodecim*. Accessed 29.4.2019. <https://www.duodecimlehti.fi/duo95167>

Ihotautitalo.fi. No date. Atooppinen ihottuma. Mistä atooppinen ihottuma johtuu. Accessed 10.10.2018. <https://www.terveyskyla.fi/ihotautitalo/ihotaudit/atooppinen-ihottuma/mik%C3%A4-on-atooppinen-ihottuma>

Ihotautitalo.fi. No date. Atooppinen ihottuma. Kortisonivoiteet. Accessed 10.10.2018. <https://www.terveyskyla.fi/ihotautitalo/ihotaudit/atooppinen-ihottuma/miten-atooppista-ihottumaa-hoidetaan/kortisonivoiteet>

Kanwar, A. 2016. Adult-onset atopic dermatitis. Indian Journal of Dermatology. Accessed 26.4.2019. <http://www.e-ijd.org/article.asp?issn=0019-5154;year=2016;volume=61;issue=6;spage=662;epage=663;aulast=Kanwar>

Karppinen, T., Ylianttila, L., Kautiainen, H., Reunala, T. & Snellman, E. 2014. Empowering Heliotherapy Improves Clinical Outcome and Quality of Life of Psoriasis and Atopic Dermatitis Patients. Accessed 29.4.2019. <https://www.medicaljournals.se/acta/content/html/10.2340/00015555-2028>

Kiiski, V. 2018. Adulthood Atopic Dermatitis. Accessed 10.06.2018. <https://helda.helsinki.fi/bitstream/handle/10138/235247/ADULTHOO.pdf?sequence=1>

Koulu, L. 2016. Potilasohje kostean kääreen käytöstä atooppisen ekseeman hoidossa. Accessed 24.4.2019. <http://www.kaypahoito.fi/web/kh/suositukset/suositus?id=nix02349&suositusid=hoi50077>

Kouotou, E., Nansseu, J., Engome, A., Tatah, S. & Zoung-Kanyi Bissek, A. 2017. Knowledge, attitudes and practices of the medical personnel regarding atopic dermatitis in Yaoundé, Cameroon. Accessed 17.4.2018. <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC5314472/>

Nicol, N., Boguniewicz, M., Strand, M. & Klinnert, M. 2014. Wet wrap therapy in children with moderate to severe atopic dermatitis in a multidisciplinary treatment program. Accessed 23.4.2019. [https://www.jaci-inpractice.org/article/S2213-2198\(14\)00180-9/abstract](https://www.jaci-inpractice.org/article/S2213-2198(14)00180-9/abstract)

Patrizi, A., Savoia, F., Giacomini, F., Tabanelli, M. & Gurioli, C. 2009. The effect of summer holidays and sun exposure on atopic dermatitis. Accessed 24.4.2019. <https://www.ncbi.nlm.nih.gov/m/pubmed/19755951/>

Reitamo, S. & remitz, A. 2003 Takrolimuusi- ja pimekrolimuusivoiteet atooppisen ihon hoidossa. Duodecim. Accessed 29.4.2019. <https://www.duodecimlehti.fi/lehti/2003/9/duo93542>

Richard, A. Shea, K. 2011 Delineation of Self-Care and Associated Concepts. Journal of Nursing Scholarship. Accessed 7.5.2019. <https://search.proquest.com/docview/896734856/fulltext/AEF1F91C1A6E4DEFPO?accountid=12003>

Shenefelt, P. 2010. Psychological interventions in the management of common skin conditions. Psychology Research and Behavior Management. Accessed 29.4.2019. <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC3218765/>

Suomalaisen Lääkäriseuran Duodecimin, Suomen Yleislääketieteen yhdistyksen, Suomen Ihotautilääkäriyhdistyksen, Atopialiiton ja Iholiiton asettama työryhmä. 2016. Atooppinen ekseema. Käypä hoito -suositus. Accessed 29.4.2019 <http://www.kaypahoito.fi/web/kh/suositukset/suositus?id=hoi50077#NaN>

Thomas, J. 2008. Atopic dermatitis: current management strategies for adult patients, Dermatology Nursing. Accessed 24.3.2019. <http://search.ebscohost.com/login.aspx?direct=true&db=c8h&AN=105602105&site=ehost-live>

Varantola, K., Launis, V., Helin, M., Spoof, S & Jäppinen, S. 2013. Responsible conduct of research and procedures for handling allegations of misconduct in Finland. Accessed 10.5.2019. https://www.tenk.fi/sites/tenk.fi/files/HTK_ohje_2012.pdf

Watkins, J. 2012. Diagnosis and treatment of atopic eczema in children and adults. Accessed 22.3.2019. <http://web.a.ebscohost.com.nelli.laurea.fi/ehost/detail/detail?vid=7&sid=ddc51f91-1c2f-4b75-9ea7-5b8e173678f4%40sessionmgr4008&bdata=JnNpdGU9ZWhvc3QtbGl2ZQ%3d%3d#AN=108098737&db=c8h>

Wittkowski, A., Richards, H., Griffiths, C. & Main, C. 2003. The impact of psychological and clinical factors on quality of life in individuals with atopic dermatitis. Journal Of Psychosomatic Research. Accessed 10.9.2018 <http://web.b.ebscohost.com.nelli.laurea.fi/ehost/detail/detail?vid=18&sid=4b9ead69-9540-49f8-8aef-5eafa7037c3c%40pdc-v-sessionmgr03&bdata=JnNpdGU9ZWhvc3QtbGl2ZQ%3d%3d#AN=14582177&db=afh>

Wollenberg, A., Barbarot, S., Bieber, T., Christen-Zaech, S., Deleuran, M., Fink-Wagner, A, Gieler, U., Girolomoni, G., Lau, S., Murafo, A., Czarnecka-Operacz, M., Schäfer, T., Schmid-Frendelmeier, P., Simon, D., Szalai, Z., Szepietowski, J.C., Taieb, A., Torrelo, A., Werfel, T. & Ring, J. 2018. Consensus-based European guidelines for treatment of atopic eczema (atopic dermatitis) in adults and children: part I. Journal of the European Academy of Dermatology & Venereology. Accessed 16.4.2019. <https://onlinelibrary.wiley.com/doi/full/10.1111/jdv.14891>

Pictures in the guide leaflet:

Luotonen, A. 2019. Hand and cream picture and violet picture

Selinmaa, M. 2019. Symptoms in the upper part of the body.

Vantaan allergia ja astmayhdistys. 2019. Allergia astma yhdistys Vantaa Kerava Accessed 3.5.2019 <https://vantaa.allergia.fi/>

Laurea logo. 2019. Accessed 30.4.2019. <https://www.laurea.fi/laurea/medialle>

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Attachment 1 First page of the guide leaflet

Peseytyminen, vaatetus ja ilmastohoito

Suihkussa on hyvä käydä joka päivä, ainakin silloin, kun ihossa on tulehdus. Miedot hajusteettomat pesuaineet sopivat atooppiselle iholle. Suihkun jälkeen pitää heti levittää paikalliset voiteet, jotta kosteus ei ehtisi haihtua ihosta. Parhaat vaatet materiaalit ovat puuvilla tai silkki. Hygieniasta ja vaatteiden puhtaudesta huolehtiminen edesauttaa ehkäisemään iholla tulehdusta aiheuttavien mikrobin olemassaoloa. Aurinko ja suolainen vesi ilmastoterapiana edesauttaa ihon kunnon kohentumista.

Rutiinit ja itseopiskelu

Ihohoitorutiinit on hyvä muistaa ihon kunnon säilyttämiseksi. Sairauden ja sen hoidon opiskelu auttaa ymmärtämään sairautta ja löytämään sopivat tuotteet ja hoitomenetelmät.

Stressi ja raapiminen

Atooppinen iho on yhteydessä stressiin. Stressin lievittäminen erilaisin rentoutumiskeinoin auttaa myös ihosi kuntoa. Raapimisesta voi tulla tapa purkaa stressiä tai ahdistusta. Tapaa voi yrittää korvata kylmällä vedellä tai viilentävällä voiteella.

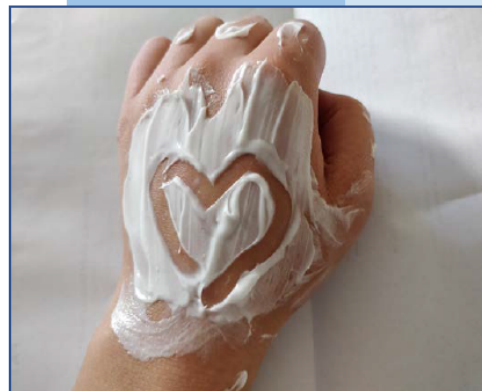
Huomio! Jos oireet pahenevat tai haittaavat elämää, ota yhteys lääkäriin.

Tämän oppaan ovat toteuttaneet Laurea amk:n opiskelijat Alli Luotonen ja Kaisa Oras. Tiedon pohjana on käytetty tekijöiden opinnäytetyötä: Self-Care methods of Adulthood Atopic Dermatitis. Opas on tehty Vantaan ja Keravan allergia- ja astmayhdistyksen käyttöön.

ALLERGIA
ASTMA
YHDISTYS
Vantaa Kerava

**LAU
REA** Yhdessä
enemmän

Itsehoito- opas aikuiselle atoopikolle



Kuvituskuva,, Luotonen 2019

30.4.2019

Attachment 2: Second page of the guide leaflet



Kuvituskuva, Luotonen 2019

Perusvoiteet

Perusvoiteet ovat pohja tehokkaalle tulehduksen ennaltaehkäisylle. Voiteita on saatavilla monenlaisia. Atooppikon iho on yksilöllinen, joten on hyvä kokeilla useita vaihtoehtoja parhaan löytämiseksi. Hyväksi todettua rasvaa ei kuitenkaan tarvitse vaihdella. Perusvoiteen on hyvä olla hajusteeton, vähän lisäaineita sisältävä ja ihoa ärsyttämätön. Kuivalle ja karstaiselle iholle sopii paremmin rasvapitoisempi vaihtoehto. Atooppinen iho kannattaa rasvata kahdesti päivässä ja aina peseytymisen jälkeen. Rasvat sitovat kosteuden ihoon estämällä ihon kuivumisen.

Tulehtunut iho hoidetaan tulehdusta hoitavilla voiteilla. Älä laita perusrasvaa hoitavien rasvojen päälle, vaan pidä ainakin tunnin tauko.

Atooppisen ihon voi saada kuriin jo tehokkaalla perusrasvauksella ja lehahtamisen laukaisevien tekijöiden tietämisellä.

Kortisonivoiteet

Kortisonivoiteita käytetään ihon tulehdukseen (punoittava rikki oleva iho) kuuriluontoisesti tai ylläpitohoitona. Hoidon onnistumiseksi kuurin kesto on kaksi viikkoa, hoitoa keskeyttämättä. Voidetta levitetään kerran päivässä. Tämän jälkeen siirrytään ylläpitohoitoon tai minimissään kahden viikon tauolle.

Kalsineuriinin estäjät

Kalsineuriinin estäjät vastaavat keskivahvaa kortisonia ja ovat hyvä vaihtoehto ohuemmille ihoalueille, kuten kasvoille ja silmäluomille. Voidetta levitetään 1 - 2 kertaa päivässä. Käyttö jatkuu kuurina, kunnes aktiivinen tulehdus on parantunut. Sen jälkeen siirrytään tauolle tai ylläpitohoitoon.

Atooppinen iho on yksilöllinen ja usein kausittaisesti lehahtava.

Tulehtunut atooppinen iho, Selinmaa 2018



Ylläpitohoito

Ylläpitohoito on todettu hyväksi avuksi, jos ihottuma lehahtaa helposti uudelleen kuurin jälkeen. Tarkoituksena on ylläpitää kuurilla saavutettua ihon kuntoa. Tämä tarkoittaa tulehdusta hoitavan voiteen levittämistä iholle kahdesti viikossa. Ylläpitohoitoa jatketaan tarvittaessa. Jos iho lehahtaa ylläpitoohoidon aikana, palataan takaisin kuuriluontoiseen hoitoon.

Sidokset

Erittäin kutiseva, ärtynyt ja kuiva iho saattaa hyötyä kosteista puuvillasidoksista. Puhtaat sidokset kostutetaan lämpimässä suolavedessä 0,9% ja rutistetaan kuivemmiksi. Sitten ne asetetaan rasvatulle iholle. Päälle laitetaan kuivia sidoksia, ne saa pysymään paikallaan sukkasidoksella tai teipillä. Kosteat sidokset pehmentävät ihoa, lievittävät kutinaa ja viilentävät ihoa.

Ihoa ärsyttävien tekijöiden tunnistaminen

Atooppista ihoa ärsyttäviä tekijöitä on useita ja ne ovat erittäin yksilöllisiä. Sairastavan olisi hyvä tunnistaa ihossa reaktioita laukaisevat tekijät ja välttää niitä mahdollisuuksien mukaan. Voimakkaat pesuaineet, hajusteet, lämpötila, ilmankosteus, ilmansaasteet ja ruoka-aineet voivat olla sellaisia, jotka aiheuttavat ihossa ärsytystä.