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# Impact of Scabies on Quality of Life and Recent Advances in Management: A Systematic Review

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## Supplementary File

## Abstract

**Introduction:** Scabies are a highly transmittable disease of the skin. It is caused by a specific mite named *Sarcoptes scabiei*. Individuals who are infected with scabies have a miserable life, and their quality of life is poor. It impacts the quality of life by causing physical discomfort due to itching. Not only does it lead to the mental distress of a diseased individual, but it also leads to social isolation due to the stigma associated with this condition. This systematic review highlights the profound effect of scabies on the lives of affected individuals and the recent breakthroughs in the management of scabies.

**Purpose:** The purpose of this article is to shed light on the impact of scabies on the quality of life. We also discussed the advancements in the management of this disease, which impacts life physically and socially.

**Method:** We included randomized controlled trials, clinical trials, and observational studies. Studies with full-text access were included. Case reports, letters, and systematic/narrative reviews were excluded from the search. 180 records were screened up to March 2024, of which 129 articles were from PubMed and 51 from Google Scholar. 22 articles were thoroughly screened by two different reviewers independently and included in the review. Studies were carried out with no restrictions on age or sex, including the pediatric and adult populations.

**Conclusion:** Findings indicate a significant correlation between scabies and poor quality of life. Scabies most commonly affect children of lower socioeconomic status and in resource-limited settings. Scabies can lead to severe complications such as rheumatic heart disease, kidney diseases, and a variety of secondary bacterial infections; therefore, advances in treatment strategies are needed. Currently, Permethrin and Ivermectin have been used for treatment. Moxidectin, a new drug, is undergoing clinical trials to replace permethrin in regions with high resistance. The interventions need to be patient-centered, and new drugs need to be developed that have anti-parasitic actions and also lead to the prevention of secondary bacterial infections.

**Keywords:** Scabies; Quality of life; Psychology; Management

## Supplementary File

**Supplementary Table 1:** Gives an overview of the 29 studies included in the systematic review. The publication years ranged from 2014 to 2024.

| Authors and year | Country | Study Design | intervention | Institution | Outcome measures | Safety profile | Participants | Significant findings |
|---|---|---|---|---|---|---|---|---|
| Meyersburg, et al. 2024 | Austria | RCT | The study highlights the reduced efficacy of topical permethrin 5% in treating scabies, possibly due to increasing mite resistance. BB 25% demonstrated a | University Hospital Salzburg of the Paracelsus Medical University Salzburg, Salzburg, AustriA | Treatment efficacy was assessed based on dermoscopy-verified cure rates at a 3-week follow-up visit. Tolerability and safety profiles of both topical permethrin 5% and BB 25% were evaluated, focusing on adverse | Permethrin 5% cream demonstrated excellent tolerability and safety, with minimal adverse effects reported. BB 25% emulsion, on the other hand, produced a burning sensation in | 110 | The study compared the efficacy of topical permethrin 5% and benzyl benzoate (BB) 25% in treating scabies. Dermoscopy-verified cure rates at a 3-week follow-up were 27% in the permethrin group and 87% in the BB group. Permethrin demonstrated a lack of efficacy in the majority of scabies |

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| | | | significantly higher cure rate and reasonable tolerability despite the reported burning sensation. | | reactions and patient-reported symptoms. | 43% of patients, indicating lower tolerability compared to permethrin. | | cases, whereas BB showed a significantly higher cure rate. |
| Hardy, et al. 2021 | Republic of Fiji | RCT | The findings suggest that implementing a 1-dose ivermectin-based Mass Drug Administration (MDA) could be as effective as the traditional 2-dose regimen for controlling scabies at the community level.<br>A screen-and-treat strategy using topical permethrin also showed substantial reductions in scabies prevalence. | Murdoch Childrenâ€™s Research Institute, Melbourne, Victoria, Australia | Scabies prevalence was the primary outcome measure, assessed at baseline and 12 months post-intervention.<br>The study also evaluated the effectiveness of different MDA strategies (2-dose vs. 1-dose ivermectin-based MDA) and a screen-and-treat approach with topical permethrin in reducing community-level scabies burden. | headache, dizziness, nausea, diarrhea, or abdominal discomfort.<br>Neurological symptoms: Rarely, ivermectin can cause neurological adverse effects like drowsiness, tremors, or confusion, especially at higher doses. | 3812 | The study compared the effectiveness of different community-wide treatment strategies for controlling scabies prevalence in Fijian villages.<br>Both the 2-dose ivermectin-based Mass Drug Administration (MDA) and 1-dose ivermectin-based MDA, as well as a screen-and-treat approach with permethrin, substantially reduced scabies prevalence at 12 months.<br>The 1-dose ivermectin-based MDA was found to be non-inferior to the 2-dose regimen in terms of reducing scabies prevalence in the community. |
| Alipour, et al. 2015 | Iran | RCT | | Tabriz university of medical | oral ivermectin showed higher efficacy with cure rates of | Both treatments were well-tolerated, | 420 | Oral ivermectin demonstrated superior and sustained clearance |

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| | | | | scien | 61.9% after a single dose at 2 weeks and 78.5% after repeated treatments at 4 weeks. Sulfur ointment achieved lower cure rates initially (45.2% at 2 weeks, improving to 59.5% at 4 weeks with repeated applications) | with mild irritation being the main reported adverse event. | | of scabies lesions compared to sulfur ointment, highlighting its effectiveness as an alternative treatment option for scabies |
| Marina, et al. 2022 | Indonesia | RCT | . | 1 Dermatology and Venereology Department, Faculty of Medicine, Universitas Indonesiaâ€“ Dr Cipto Mangunkusumo General Hospital, Jakarta, IndonesIa | . | . | . | . |
| Romani, et al. 2019 | Solomon islands | Rct | . | The Kirby Institute, UNSW, Sydney, NSW, | Outcome measures included comparing scabies and | . | 26188 | After mass drug administration, scabies prevalence reduced by 88% (95% CI 76.5â€“99.3) and |

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| | | | | Australia | impetigo prevalence in ten randomly selected villages at 12 months versus baseline to ensure representativen ess. Additionally, outpatient clinic attendance for any reason was analyzed in the 3 months post-mass drug administration compared to the pre-administration period (excluding the administration month). Further comparisons included clinic attendance before and after administration within shorter (1 month) and longer (12 months) time frames, excluding the administration month. Finally, paired analyses of scabies and impetigo prevalence | | | impetigo by 74% (63.4â€“84.7) at 12 months. Outpatient clinic attendance decreased by 36.1% (95% CI 34.7â€“37.6) overall and by 50.9% (95% CI 48.6â€“53.1) for skin sores, boils, and abscesses. Integrating ivermectin-based treatment with azithromycin for trachoma achieved high efficacy, supporting population-level control strategies |

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| | | | | | were conducted in four baseline villages at 12 months, and baseline | | | |
| Illyas, et al. 2023 | Pakistan | RCT | . | Fatima Jinnah Medical University, LahorE | The primary outcome measures included clinical grading of scabies lesions and itch severity scores. Efficacy was assessed based on the proportion of patients showing improvement in symptoms and resolution of scabies lesions after one week of treatment. | Common adverse events associated with oral ivermectin may include gastrointestinal symptoms (such as nausea, vomiting, diarrhea), dizziness, and skin reactions. Topical permethrin can sometimes cause local skin irritation or allergic reaction | 60 | Efficacy Comparison: Permethrin 5% demonstrated higher efficacy compared to oral ivermectin in treating scabies, with 73.3% of patients showing efficacy in the permethrin group versus 26.7% in the ivermectin group (p-value < 0.05). Age Distribution: The mean age of patients receiving permethrin was slightly higher than those receiving ivermectin, but this difference did not impact the efficacy outcomes significantly. |
| Susanna J. Lake, et al. 2018 | Solomon Islands | Cluster RCT | 20 villages randomly assigned to receive either one dose (Arm 1) or two doses 7â€“14 days apart (Arm 2) of Mass Drug Administration (MDA). | Tropical Diseases Research Group, Murdoch Childrenâ€™s Research Institute, Melbourne, Australia, 2 Departm | The primary outcome measure of this trial was the change in scabies prevalence at 12 months post-Mass Drug Administration (MDA) compared to baseline (pre-MDA). | Pregnant women, young children, and individuals with specific contraindications received topical permethrin instead. Adverse effects such as | 20 villages | There was no reduction in scabies prevalence in either the one or two dose arms. However there was a reduction in the severity of scabies |

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| | | | | ent of Paediatrics, University of Melbourne, Melbourne, Australia, 3 Melbourne Childrenâ€™s Global Health, Melbourne, Australia | Secondary outcome measures included scabies prevalence at 24 months post-MDA, as well as prevalence rates of impetigo (a bacterial skin infection often coexisting with scabies) at the same time points | gastrointestinal symptoms, dizziness, and skin reactions were monitored and managed by healthcare providers | | |
| Matthewman, et al. 2020 | Gabon | RCT | Treating all family members and close contacts of individuals with scabies is a common approach recommended to prevent disease spread, but the evidence supporting this practice is limited. | . | Primary Endpoint: Clinical cure after 28 days. Secondary Endpoint: Proportion of affected household members per household after 28 days. | . | 79 | The study investigated the effectiveness of treating all family members and close contacts of individuals with scabies, compared to treating only the affected individuals. It found that treating household contacts alongside affected individuals may lead to improved clinical cure rates and reduced scabies prevalence within households. However, the observed benefit was less pronounced than anticipated, suggesting the need |

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| | | | | | | | | for further research to definitively evaluate this practice. |
| Lake, et al. 2020 | Solomon Islands | RCT | The RISE trial aims to address the challenges associated with implementing two-dose ivermectin-based MDA for scabies control in resource-limited settings. If the trial demonstrates non-inferiority of one-dose MDA compared to two doses, this could significantly simplify and streamline scabies control programs, particularly in high-prevalence areas like the Solomon Islands. | . | The primary outcome measure is the reduction in scabies prevalence after 12 months, comparing one-dose MDA to two-dose MDA. Secondary outcome measures include impetigo prevalence after 12 and 24 months, scabies prevalence at 24 months post-intervention, and the impact on healthcare facility visits related to scabies and impetigo. | . | 20 villages | primary objective of the RISE trial is to determine if ivermectin-based mass drug administration (MDA) with one dose is as effective as MDA with two doses in reducing the prevalence of scabies after 12 months. Secondary objectives include assessing the impact on impetigo prevalence after 12 and 24 months, scabies prevalence at 24 months post-intervention, and the impact on healthcare facility presentations with scabies and impetigo. |
| Sungkar, et al. 2014 | Indonesia | RCT | The findings suggest that | . | The primary outcome | permethrin is known to | 69 | The study compared the effectiveness of |

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| | | | standard whole-body permethrin treatment for scabies is as effective as a modified approach limited to lesion-only application followed by bathing with soap. While the differences in cure rates were not statistically significant, the recurrence rate was lower with standard treatment. Further research with larger sample sizes may be needed to confirm these results. | | measures were the cure rates and recurrence rates of scabies after three weeks of treatment. These rates were compared across the three treatment groups to determine the effectiveness of each approach. | cause side effects such as erythema, pain, itching, and prickling sensation when applied all over the body. | | standard whole-body permethrin treatment for scabies against a modified approach limited to lesion-only application followed by bathing with regular or antiseptic soap. The cure rates after three weeks were 95.7% for standard treatment, 91.3% for lesion-only with regular soap, and 78.3% for lesion-only with antiseptic soap. Recurrence rates were 8.7% for standard treatment, 13% for lesion-only with regular soap, and 26.1% for lesion-only with antiseptic soap. |
| Meyersburg, et al. 2023 | . | RCT | The study's findings suggest that both topical benzyl benzoate and oral ivermectin | 1Department of Dermatology and Allergology, University | Treatment outcome was assessed by dermoscopy at a 3-week follow-up visit. Cure rates and treatment | Oral ivermectin demonstrated an excellent safety profile with good tolerability. | 224 | Both topical benzyl benzoate (BB) and oral ivermectin showed comparable therapeutic efficacy, with cure rates of 87% in the BB group and 86% in the |

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| | | | are effective first-line therapies for scabies treatment, with comparable therapeutic efficacy. For cases of initial treatment failure or recalcitrant and extensively infested cases, a combination of BB plus ivermectin may be considered for improved outcomes. The study highlights the importance of alternative treatments given the reported decreasing efficacy of standard 5% permethrin cream for scabies | Hospital Salzburg of the Paracelsus Medical University, Salzburg, Austria | response upon retreatment were primary outcome measures. | Topical benzyl benzoate (BB) caused short burning sensations in 14% of patients. | | ivermectin group. In cases of initial treatment failure, retreatment with either BB or ivermectin, and their combination, demonstrated improved treatment responses. The combination of BB plus ivermectin showed particularly high success rates upon retreatment. |
| Behera, et al. 2021 | India | RCT | | Society for Educatio | Patients diagnosed with scabies and their contacts received supervised treatment with oral Ivermectin in six | | | Results showed a significant reduction in the risk of scabies |

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| | | | | n Action and Research in Community Health (SEARCH), Gadchiroli, Maharashtra, India | villages (intervention ). In the control arm (six villages), patients diagnosed with scabies were referred to the nearest clinic for treatment with skin creams and lotions.(control) | | | in villages where oral Ivermectin was used compared to villages where skin creams were used:<br>Risk reduction of 79% at two months post-treatment.<br>Risk reduction of 51% at twelve months post-treatment. |
| Marks, et al. 2020 | Solomon Islands | RCT | The study highlights the ancillary benefits of ivermectin MDA for scabies control, demonstrating a reduction in S. stercoralis seroprevalence in addition to its intended impact.<br>The findings suggest potential synergies in integrating deworming programs (e.g., albendazole) with ivermectin to control multiple | 1Clinical Research Department, Faculty of Infectious and Tropical Diseases, London School of Hygiene and Tropical Medicine, London, United Kingdom, | Seroprevalence of antibodies to NIE was measured at baseline and 12 months post-MDA to assess the impact of ivermectin on S. stercoralis exposure. Absolute and relative reductions in seroprevalence were calculated to evaluate the effectiveness of the MDA. | . | 1291 | The study conducted in selected communities in the Solomon Islands demonstrated a decrease in seroprevalence of antibodies to NIE (indicative of S. stercoralis exposure) one year after a single ivermectin Mass Drug Administration (MDA) aimed at scabies control.<br>The overall reduction in seroprevalence was accompanied by decreases in median fluorescence intensity against NIE, particularly among children aged 5 years or older who received ivermectin. |

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| | | | neglected tropical diseases (NTDs) concurrently. | | | | | |
| Marks, et al. 2019 | . | RCT | The study highlights the effectiveness of ivermectin-based MDA in reducing scabies and impetigo prevalence. Co-administration of azithromycin did not provide additional benefits in terms of reducing prevalence but led to changes in the bacterial profile of impetigo lesions. The transient increase in macrolide-resistant S. aureus strains following azithromycin MDA | 1Clinical Research Department, Faculty of Infectious and Tropical Diseases, London School of Hygiene & Tropical Medicine | The primary outcomes measured were scabies and impetigo prevalence at baseline and after 12 months. Secondary outcomes included the proportion of impetigo lesions containing specific bacteria and the detection of antimicrobial resistance. | . | 6 communities | The study investigated the impact of co-administering azithromycin with ivermectin-based mass drug administration (MDA) on the prevalence of scabies and impetigo. The results showed that both treatment arms (ivermectin-only and combined treatment) led to substantial reductions in scabies and impetigo prevalence after 12 months. The proportion of impetigo lesions containing pyogenic streptococci decreased significantly following MDA. However, there was a transient increase in the proportion of macrolide-resistant Staphylococcus aureus strains detected after azithromycin MDA. |

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| | | | underscores the importance of antimicrobial stewardship. | | | | | |
| Thomas, et al. 2018 | Australia | RCT | . | . | . | . | 200 | . |
| Anissa, et al. 2022 | Indonesia | RCT | The study provides initial insights into the potential effectiveness of BlacksoapÂ® as an adjunctive therapy for scabies treatment, although further research with larger sample sizes and longer follow-up periods may be needed to confirm these findings. The delayed but ultimately higher cure rate observed in the BlacksoapÂ | . | Primary Outcome: Cure rate of scabies after 4 weeks of treatment. Secondary Outcomes: Pruritus VAS scores, TEWL scores, and assessment of side effects between the intervention and control groups. | The study did not report any significant adverse effects associated with the use of BlacksoapÂ® as an adjunctive therapy for scabies treatment. | 78 | Cure Rate: The cure rate in the intervention group (receiving BlacksoapÂ®) was lower than the control group in the first week (75% vs. 81%), but higher in the fourth week (97% vs. 92%). This indicates a potential delayed but more effective response to treatment with BlacksoapÂ®. Pruritus VAS Scores: There was no significant difference in pruritus Visual Analog Scale (VAS) scores between the BlacksoapÂ® group and the placebo group, suggesting comparable relief of itching with both treatments. Transepidermal Water Loss (TEWL) Scores: Similarly, TEWL scores did not significantly differ between the two |

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| | | | ® group suggests that the soap may have a beneficial effect when used in conjunction with standard permethrin cream therapy. The study's use of standardized outcome measures (pruritus VAS and TEWL) provides valuable objective data on symptom relief and skin barrier function, supporting the comparability of BlacksoapÂ® to placebo in terms of efficacy and safety. Non-parametric statistical analysis was employed | | | | | groups, indicating no notable impact of BlacksoapÂ® on skin barrier function compared to placebo.<br>Side Effects: There were no considerable differences in reported side effects between the BlacksoapÂ® group and the placebo group, suggesting similar safety profiles for both treatments. |

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| | | | due to the nature of the data, ensuring robust evaluation and interpretation of the study results. | | | | | |
| Usman, et al. 2021 | Pakistan | RCT | The study concludes that both topical Ivermectin 1% and permethrin 5% are equally beneficial in managing scabies, achieving a high remission rate of 94% overall. While the difference in remission rates between the two treatment groups was not statistically significant, other factors such as treatment adherence, | . | The primary outcome measure was treatment efficacy, assessed by the proportion of patients achieving remission from scabies after 4 weeks of topical treatment. Secondary outcome measures may have included patient-reported improvement in symptoms (itching, lesion count) and adverse effects related to treatment. | . | 200 | The study found that both topical Ivermectin 1% and topical permethrin 5% were effective in treating scabies, with remission achieved in 94% of patients overall. Although the difference was statistically insignificant (p-value=0.074), a slightly higher remission rate (97%) was observed in the permethrin group compared to the Ivermectin group (91%). |

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| | | | patient preferences, and potential adverse effects should be considered when selecting the optimal treatment for individual patients. | | | | | |
| Shaheen, et al. 2017 | Pakistan | . | The findings of this study support the use of combination therapy (topical and oral ivermectin) as a safe and effective treatment option for uncomplicated scabies. The significant reduction in itching and lesion count observed with combination therapy highlights its potential benefits over | . | . | Overall, the combination of topical and oral ivermectin was well-tolerated with fewer reported adverse events compared to permethrin and topical ivermectin alone. | 236 | The combination of topical and oral ivermectin demonstrated superior efficacy compared to permethrin and topical ivermectin alone.<br>Reduction in Itching: By the first week, the combination treatment group experienced a significant reduction in severity of itching (77.6%) compared to topical ivermectin (61.8%) and permethrin (8.3%).<br>Decrease in Lesions: Similarly, the combination treatment group showed a notable decrease in the number of lesions (53.9%) compared to topical ivermectin |

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| | | | permethrin and topical ivermectin alone. | | | | | (55.2%) and permethrin (19%) at the first follow-up. Long-Term Effects: By the fourth week, the combination therapy maintained its efficacy with only 15.8% of patients reporting severe itching, significantly lower than the other treatment groups. |
| Al-Asadi, et al. 2023 | Iraq | RCT | study's findings suggest that combining topical and oral ivermectin provides enhanced efficacy in managing uncomplicated scabies compared to permethrin or topical ivermectin alone. The significant reduction in itching and lesion count observed with combination therapy highlights its potential as a more effective | University of Basrah, Basrah, Iraq | study aimed to evaluate the efficacy and safety of different treatments for uncomplicated scabies lesions. Outcome measures included:<br><br>Severity of itching reduction<br>Reduction in the number of scabietic lesions<br>Patient-reported adverse events and safety profile of treatments | Overall, the combination of topical and oral ivermectin was deemed safe and well-tolerated, with fewer adverse events reported compared to other treatment modalities. | 236 | Treatment Efficacy: The combination group (topical and oral ivermectin) demonstrated superior efficacy compared to permethrin and topical ivermectin alone.<br>Reduction in Itching: At the first week, the combination treatment group showed a significant decrease in severity of itching (77.6%) compared to topical ivermectin (61.8%) and permethrin (8.3%).<br>Reduction in Lesions: Similarly, the combination treatment group had a significant reduction in the number of lesions (53.9%) compared to topical ivermectin (55.2%) and |

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| | | | treatment option for scabies | | | | | permethrin (19%). Long-Term Efficacy: By the fourth week, only 15.8% of patients in the combination treatment group reported severe itching, significantly lower than the other groups. |
| Manjhi, et al. 2014 | India | RCT | The study suggests that oral ivermectin can be considered as an alternative to topical scabicidal treatments, especially in cases where topical therapies are poorly tolerated or potentially irritating. Topical permethrin remains a standard and effective treatment for scabies, demonstrating slightly higher efficacy compared to other | IGIMS, Sheikhpura, Patna, Bihar, India | Efficacy was measured based on improvement in severity of pruritus and lesion severity at 1-week and 6-week follow-ups. The percentage improvement in these parameters was used to compare the effectiveness of different treatment modalities | Oral ivermectin was well-tolerated and did not cause skin irritation or central nervous system side effects since it does not cross the blood-brain barrier. Topical treatments (permethrin, GBHC, BB lotion) may cause local skin irritation and discomfort, which could affect compliance. | 240 | Oral ivermectin (200 Î¼g/kg body weight) and topical permethrin (5% cream) demonstrated similar efficacy in treating scabies, with both showing significant improvement in severity of pruritus (85% and 90% respectively) and lesion severity (80% and 88.33% respectively) at follow-up. Topical permethrin was more effective than topical gamma benzene hexachloride (GBHC) lotion (1%) and topical benzyl benzoate (BB) lotion (25%). |

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| | | | topical options. The findings support the use of oral ivermectin due to its ease of administration and favorable safety profile, particularly in patients who may have issues with compliance or skin sensitivity to topical agents. | | | | | |
| Sattar, et al. 2023 | Pakistan | RCT | The study findings align with prior research on scabies treatments. Challenges in application and drug resistance could impact treatment efficacy. Further investigations are needed, especially in | Department of Dermatology, Pak Emirates Military Hospital, Rawalpindi. | Participants underwent skin examinations and were randomly assigned to receive either 5% permethrin cream or oral ivermectin. Efficacy was assessed at 2 weeks post-treatment based on clinical improvement and negative microscopy. | Both permethrin cream and oral ivermectin were generally well-tolerated. Symptomatic relief was provided with hydroxyzine. No serious adverse events were reported. | 60 | There was no significant difference in scabies cure rates between permethrin (73.3% efficacy) and ivermectin (70% efficacy) groups (P=0.775). Notably, patients in both groups remained symptomatic after treatment, possibly due to drug resistance. |

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| | | | pediatric populations, to optimize treatment strategies and address safety concern | | | | | |
| Verma, et al. 2020 | India | RCT | | Rohilkhand Medical College and Hospital | Significant improvement in scabies severity was seen at the 1st and 2nd followâ€‘up in both groups (P < 0.001). The cure rate was 2%, 96.1%, and 100% in Group A, while 68%, 98%, and 100% in Group B at each followâ€‘up, | Adverse events were reported nine and 12 times in Groups A and B, | 106 | Two applications of 0.5% topical IVM cream and single dose of oral IVM are equally efficacious and safe for the treatment of scabies at the end of the 2nd and 4th weeks |
| Lake, et al. 2022 | Solomon Islands | Cross sectional study. | . | aTropical Diseases Research Group, Murdoch Childrenâ€™s Research Institute, Melbourne, Victoria, Australia; | Dermatology Life Quality Index (DLQI) and Children's Dermatology Life Quality Index (CDLQI) to assess the impact of scabies on Health-Related Quality of Life (HRQoL) in adults and children. Both indices demonstrated specificity in populations affected by | . | 1051 + 604 | scabies has a measurable impact on HRQoL in the Solomon Islands, affecting various domains such as symptoms, school/work performance, and daily activities. Notably, the study highlights the cultural acceptance of scabies within the community, potentially influencing reporting and perceptions of disease impact. The study underscores |

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| | | | | | scabies, with increased impact correlating with disease severity. | | | the need for improved interventions and culturally tailored measures to address scabies' burden effectively in endemic regions. |
| StÃ¤nder, et al. 2021 | . | . | The study provides valuable insights into the pathophysiology of scabies-related itch, highlighting the role of non-histaminergic mechanisms in mediating itch sensations. Identification of specific receptors and markers associated with scabies itch opens up new avenues for developing targeted therapies aimed at alleviating itch symptoms. | University of LÃ¼beck, LÃ¼beck, Germany, | Outcome measures included the assessment of elevated levels of non-histaminergic mediators of itch (TRPV1, TRPA1, PAR-2, tryptase+ cells) in scabies-infected skin compared to healthy controls. Complications related to scabies itch, such as disruptions in the skin barrier and increased susceptibility to bacterial infections, were also examined as outcomes. | | . | Specific receptors and markers (TRPV1, TRPA1, PAR-2, and tryptase+ cells) associated with non-histaminergic itch were found to be upregulated in scabies-infected skin, suggesting these as potential therapeutic targets for managing scabies-related itch. Complications linked to scabies itch were discussed, highlighting the role of immune responses towards mites and mite-derived complement inhibitors in promoting bacterial infections and disrupting the skin barrier. |
| KoçY?ld?r?m, et al. | . | Cross | The study underscores | Department | The impact of scabies on QoL | . | 85 | The study assessed the impact of scabies |

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| 2023 | | sectional study | the significant impact of scabies on the QoL of affected individuals, highlighting the need for comprehensive management strategies that consider both the physical and psychological aspects of the disease. The positive correlations observed between disease severity, treatment history, and QoL impairment further emphasize the importance of timely and effective interventions. | Dermatology and Venereology, UÅŸak University Training and Research Hospital, UÅŸak, Turkey | was assessed using the Dermatology Life Quality Index (DLQI), which measures how much a skin condition affects the patient's life. Depression and anxiety levels were evaluated using the Beck Depression Scale (BDS) and Beck Anxiety Scale (BAS), respectively. | | | on the quality of life (QoL) of adult patients and evaluated the relationship between scabies-related impairment in QoL and levels of depression and anxiety. Results showed that scabies significantly affects the QoL of patients, with 72.2% experiencing moderate to extremely large impacts. The duration and severity of the disease, as well as the number of treatments received, correlated positively with the degree of QoL impairment. Additionally, there was a positive correlation between depression/anxiety levels and the overall impact of scabies on QoL. |
| Amoako, et al. 2023 | Ghana | . | . | Kumasi Centre for Collaborative | Knowledge and beliefs about scabies causation and risk factors. | . | . | Participants with active or past scabies exhibited misconceptions about the causes and |

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| | | | | Research in Tropical Medicine, Kwame Nkrumah University of Science and Technology, Kumasi, Ghana, | Perceptions towards stigmatization and consequences of scabies in daily life. Treatment-seeking behaviors and delays in care. | | | risk factors, attributing scabies to poor hygiene, traditional beliefs, heredity, and drinking water. Beliefs in supernatural causes like witchcraft or curses contributed to delayed care-seeking behavior and perceived limited disease severity. Delayed diagnosis and treatment were common, with a median delay of 21 days from symptom onset to seeking healthcare. Scabies were associated with stigma, health consequences, and loss of productivity in affected individuals. |
| Wootton, et al. 2018 | Ghana | . | The study highlights the importance of addressing community beliefs and attitudes towards scabies to improve care-seeking behavior and control measures. | . | The study aimed to assess beliefs, attitudes, and practices towards scabies in central Ghana. Specifically, the study examined knowledge about scabies causes and risk factors, perceptions of stigmatization and | . | 128 | Individuals with scabies in central Ghana often delay seeking care due to beliefs and perceptions about the disease, such as associating it with curses or witchcraft. The delay in seeking care is influenced by limited understanding of the severity and transmission of scabies. Scabies is perceived |

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| | | | Health education is essential to enhance knowledge and awareness of scabies among communitie | | consequences, and treatment practices. | | | to have health consequences, stigma, and affects productivity in affected individuals. Early diagnosis and effective treatment can help dispel negative perceptions and promote care-seeking behaviors. |
| Nair, et al. 2016 | . | . | . | . | The study aimed to evaluate various demographic details, clinical features, and quality of life among patients with scabies. Specific outcome measures included:<br><br>Demographic details: Age, sex, occupation, education, socioeconomic status.<br>Clinical profile: Presenting complaints, past history, family history, and specific clinical features of scabies lesions.<br>Quality of life assessment: Impact of | . | 102 | Demographics: The study included 102 newly diagnosed scabies patients, with a slightly higher prevalence in males (50.98%) compared to females.<br>Age Group: The most affected age group was 21-40 years, representing 44.11% of patients.<br>Occupation: Students were predominantly affected (41.17%), followed by housewives (20.58%).<br>Clinical Features: Papules were the most common lesion observed (84.3%), followed by excoriations (82.3%).<br>Quality of Life: More than half of adult patients (51.6%) reported a mild effect on quality of life, while the majority of children (62.5%) reported minimal impact. |

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| | | | | | scabies on daily life activities, work, sleep, and psychosocial well-being using a structured questionnaire. | | | |
| Urban, et al. 2021 | . | . | The study underscores the significance of using DALYs to assess and prioritize skin diseases in Asian populations. By correlating DALYs with socioeconomic indicators, the research highlights disparities in disease burden based on a country's economic status. The findings suggest that resources and interventions should be tailored to address specific skin | . | The study analyzed Disability-Adjusted Life Years (DALYs) attributed to skin diseases across 50 Asian countries from 1990 to 2017. DALYs were used as a metric to quantify the burden of disease, considering age-standardized rates and comparing them with country-level socioeconomic indicators such as the sociodemographic index and gross domestic product per capita. | . | 50 countries | some Asian countries had higher or lower age-standardized Disability-Adjusted Life Year (DALY) rates for skin diseases than expected based on their socioeconomic status.<br><br>High-income Asian countries had a significant burden of inflammatory skin conditions, such as acne, alopecia areata, atopic dermatitis, contact dermatitis, decubitus ulcers, psoriasis, pruritus, and seborrheic dermatitis.<br><br>On the other hand, low-income Asian countries experienced a greater burden of infectious skin diseases. |

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| | | | disease patterns prevalent in different socioeconomic contexts within Asia | | | | | |