



## Stepping into Country: How a Short Rural Immersion Transforms Medical Students' Perspectives

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### Abstract

The objective of the study was to evaluate the impact of a short-term Rural Immersion Week on medical students' intentions to pursue rural practice and their transformative experiences. A mixed-methods study was implemented, combining pre- and post-surveys with quantitative and qualitative analysis. Quantitative data were analysed using descriptive statistics and paired t-tests, and qualitative responses were explored through thematic analysis guided by Mezirow's Transformative Learning Theory. The study was conducted at Curtin Medical School, with the immersion program held in rural areas of Western Australia. A total of 113 second-year medical students participated, with 101 completing both pre- and post-surveys included in the analysis. Quantitative analysis showed a significant increase in intentions to work rurally (pre  $M = 3.77$ ,  $SD = 0.90$ ; post  $M = 4.16$ ,  $SD = 0.90$ ;  $t(100) = -5.61$ ,  $p < .001$ ) and apply to Rural Clinical School (pre  $M = 3.80$ ,  $SD = 1.01$ ; post  $M = 4.21$ ,  $SD = 1.05$ ;  $t(100) = -4.93$ ,  $p < .001$ ). Qualitative findings revealed transformative learning, including enhanced cultural awareness, empathy, and understanding of social determinants of health. The Rural Immersion Week significantly influenced students' intentions to pursue rural practice and fostered transformative personal and professional growth. Short-term rural immersion programs are a promising strategy to inspire interest in rural healthcare careers.

**Keywords:** *rural health, medical education, rural placement, transformative learning, health professional students*

### Introduction

Medical education increasingly emphasizes immersive learning experiences that prepare students for the unique challenges and opportunities of rural healthcare settings. Rural communities frequently experience healthcare disparities due to geographic isolation, limited resources, and workforce shortages, which contribute to reduced access to specialised care and higher rates of chronic illnesses (World Health Organization, 2020). Addressing these disparities requires a new generation of healthcare providers equipped with adaptability, empathy, and a deep understanding of the social determinants of health.

One effective method for fostering these qualities in health professional students is through short-term rural immersion programs. Research has shown that these immersive experiences positively influence students' career aspirations, often encouraging them to consider future work in rural or remote healthcare (Deutchman et al., 2012; Vujcich et al., 2020; Wright et al., 2014).

Immersion programs expose students to the complexities of rural practice, such as the expanded scope of care, resourcefulness, and resilience required in these communities (Toussaint & Mak, 2010; Wright et al., 2014).

A recent literature review by the authors explores the transformative potential of rural immersion programs through the lens of Transformative Learning Theory (Nyaradi et al., 2025). The review highlights how such programs contribute to personal and professional growth, critical thinking, cultural competence, and social accountability. These findings support the value of short-term rural placements in preparing health professional students to serve underserved populations with empathy and a commitment to social responsibility.

The rural immersion week in this study builds on these insights, providing second-year medical students with an opportunity to experience rural life and engage with diverse rural communities in Western Australia. This program also introduces students to the cultural richness of the Njaki-Njaki Nyoongar, Yued Nyoongar, Gubrun, and Ballardong Nyoongar Peoples, whose histories and traditions shape the region's identity. The immersion emphasizes social determinants of health, encouraging students to consider how factors like geographic isolation, economic opportunities, and cultural heritage impact health and access to care. Supported by the Australian Government's Rural Health Multidisciplinary Training Program, Rural Health West and Rural Clinical School WA, this initiative fosters community engagement and cultural awareness, integral to preparing students for rural practice.

In this study, Mezirow's Transformative Learning Theory guides the analysis of medical students' reflective responses to the rural immersion program. The study examines how these experiences contributed to shifts in students' attitudes, values, and intentions to practice in rural settings, offering insights into the transformative potential of short-term rural placements in medical education.

### ***Transformative Learning Theory***

Transformative Learning Theory, developed by Mezirow (Mezirow, 1997), provides a comprehensive framework for understanding how adults change their perspectives through critical reflection triggered by meaningful experiences. The process begins with a "disorienting dilemma", an experience that disrupts an individual's habitual ways of thinking, prompting them to question long-held assumptions. This cognitive disruption sets in motion a reflective process in which learners critically assess their beliefs, explore alternative viewpoints, and engage in rational discourse with others. Through this reflective dialogue and examination, individuals revise their frames of reference, deeply ingrained structures of meaning shaped by culture, experience, and education, leading to a more inclusive, differentiated, and integrative worldview (Kitchenham, 2008; Mezirow, 1997). Mezirow identified ten phases in the transformative learning process: (1) a disorienting dilemma; (2) self-examination with feelings of fear, anger, guilt, or shame; (3) a critical assessment of assumptions; (4) recognition that one's discontent and the process of transformation are shared; (5) exploration of options for new roles, relationships, and actions; (6) planning a course of action; (7) acquiring knowledge and skills for implementing one's plans; (8) trying out new roles provisionally; (9) building competence and self-confidence in new roles and relationships; and (10) a reintegration into one's life based on conditions dictated by the new perspective. While not all transformative learning experiences follow these phases linearly, they provide a useful framework for analysing the depth and complexity of change in adult learners (Mezirow, 1997).

This framework is particularly relevant in health professions education, where immersive experiences in diverse communities, such as rural or Indigenous settings, often challenge students' preconceived notions about healthcare delivery, patient diversity, and their own roles as future practitioners (Frenk et al., 2010). In these contexts, transformative learning extends beyond personal growth to include a heightened awareness of social determinants of health,

cultural dynamics, and systemic inequities. Although Mezirow's theory focuses primarily on individual cognitive transformation, elements of social awareness, such as the development of critical consciousness, also emerge as integral to a holistic educational experience (Kumagai & Lypson, 2009).

### ***The Rural Immersion Week***

The Curtin Medical School (CMS) Rural Immersion Week offers second-year medical students a compulsory structured field experience in various rural towns across Western Australia. Groups of 16-18 students with two tutors and one administrator/support officer visit one of the seven towns including Moora, Dalwallinu, Wongan Hills, Kondinin/Kulin, Corrigin, Brookton, and Katanning. Over the course of four days, students live with local host families, giving them a firsthand perspective on community life and fostering connections with residents.

Each day of the immersion is organized around key learning activities that integrate cultural, social, and healthcare-focused experiences. Students visit healthcare facilities such as hospitals, GP practices and St John Ambulance services, as well as farms and local industries. Additionally, they engage with the local community through activities like the Teddy Bear Hospital for young children and high school mentoring sessions, which build student understanding of rural life and healthcare needs from a grassroots level. The program also includes sessions with Indigenous elders and community members, where students learn about the historical and cultural context of each area, emphasizing the deep connection to Country. The program is complemented by insights from Rural Health West, who is also pivotal in the organisation of the program, the Western Australia Country Health Service, the Rural Clinical School, highlighting potential career pathways in rural health.

Structured reflection sessions ending with a group presentation are integral to the program, encouraging students to process their experiences and consider how rural practice shapes healthcare delivery. Additionally, preparatory sessions, including Aboriginal health seminars, a problem-based learning tutorial, and panel discussions with rural doctors, provide students with foundational knowledge and context to maximize their engagement during the program.

## **Methods**

### ***Study Design***

This study utilized a mixed-methods approach, with quantitative and qualitative data collection through pre- and post-surveys. The objective was to assess the transformative experience of the Curtin Medical School Rural Immersion Week on second-year medical students' views and intentions to work in rural settings.

In this study, the names of towns and health-related organisations have been retained to preserve the geographic and educational context of the Rural Immersion Week. While ethics approval (Curtin University HREC #HRE2023-0654) did not explicitly require or prohibit the anonymization of place names, no individual participants or private data are identified. This decision was made to reflect the real-world setting in which the program operates and to avoid contributing to what Seelig (Seelig, 2021) refers to as "rural erasure", the unintended marginalization of rural communities through anonymization in research.

### ***Study Participants***

The study included 113 second-year medical students from Curtin Medical School, Curtin University, who participated in a four-day rural immersion program in March 2024. Curtin Medical School offers a five-year undergraduate medical program, with the first three years focused on foundational learning and the final two years dedicated to clinical training. Most students enter the program directly from high school, with a smaller number of mature-age students. The

medical program provides pathways for students from rural backgrounds and those entering through an equity-based selection process. Fourth year students have an opportunity to spend the whole year in a rural clinical placement as part of the Rural Clinical School run by the University of Western Australia.

### **Data Collection**

Data were collected using two paper-based surveys: a pre-survey administered before the immersion experience and a post-survey administered after its completion.

The pre-survey (Appendix 1) aimed to capture students' initial thoughts and expectations regarding the Rural Immersion Week. It included questions about prior experience with rural communities, perceived preparedness for the immersion, and anticipated impacts of the program on personal and professional levels. Students provided Likert-scale ratings on their intentions to work in rural areas and apply for rural clinical placements, while open-ended questions allowed them to share specific concerns, and expected benefits of the immersion experience. This survey established a baseline for assessing transformative changes in students' perspectives post-immersion.

The post-survey (Appendix 2) gathered data on changes in students' perspectives following the immersion week, examining shifts in their transformative experiences, including their understanding of rural health, cultural awareness, and personal growth. It also included Likert-scale questions to assess changes in intentions for rural practice, and applying to rural clinical placements. Additionally, the post-survey featured questions about specific aspects of the rural week, such as experiences with host families, interactions with tutors and peers, and memorable interactions within the community. Students provided feedback on the organizational aspects of the program and suggestions for improvement.

### **Data Analysis**

Quantitative data from the surveys were analysed using SPSS. Descriptive statistics, such as percentages (in bar charts), were used to summarize responses from both surveys. Paired T-tests were conducted to compare pre- and post-survey responses, particularly focusing on students' intentions to work in rural settings and to apply to rural clinical placement.

Qualitative data from the open-ended survey responses were analysed manually. To enhance analytical rigour and reduce potential bias, one author conducted the initial coding by hand, identifying recurring patterns and themes that emerged directly from the data. The second author reviewed the coding to ensure coherence and consistency in theme development. This process followed an inductive approach, allowing student voices and lived experiences to shape the thematic structure without imposing a predetermined framework. In the second stage of analysis, the identified themes were interpreted through the lens of Mezirow's Transformative Learning Theory, with the original ten phases conceptually grouped into five broader categories for the purposes of this study: *disorienting dilemmas*, *critical reflection* (self-examination, critical assessment of assumptions, and recognising that transformation is shared), *perspective transformation* (exploring new roles and planning a course of action), *navigating challenges* (acquiring knowledge and skills, and trying out new roles), and *personal growth and reintegration* (building competence and confidence in new roles, and reintegrating the new perspective). This approach enabled a theoretically informed interpretation while preserving the integrity of the students' own language and perspectives.

Curtin University Human Research Ethics Committee has approved this study with approval number: HRE2023-0654.

## Results

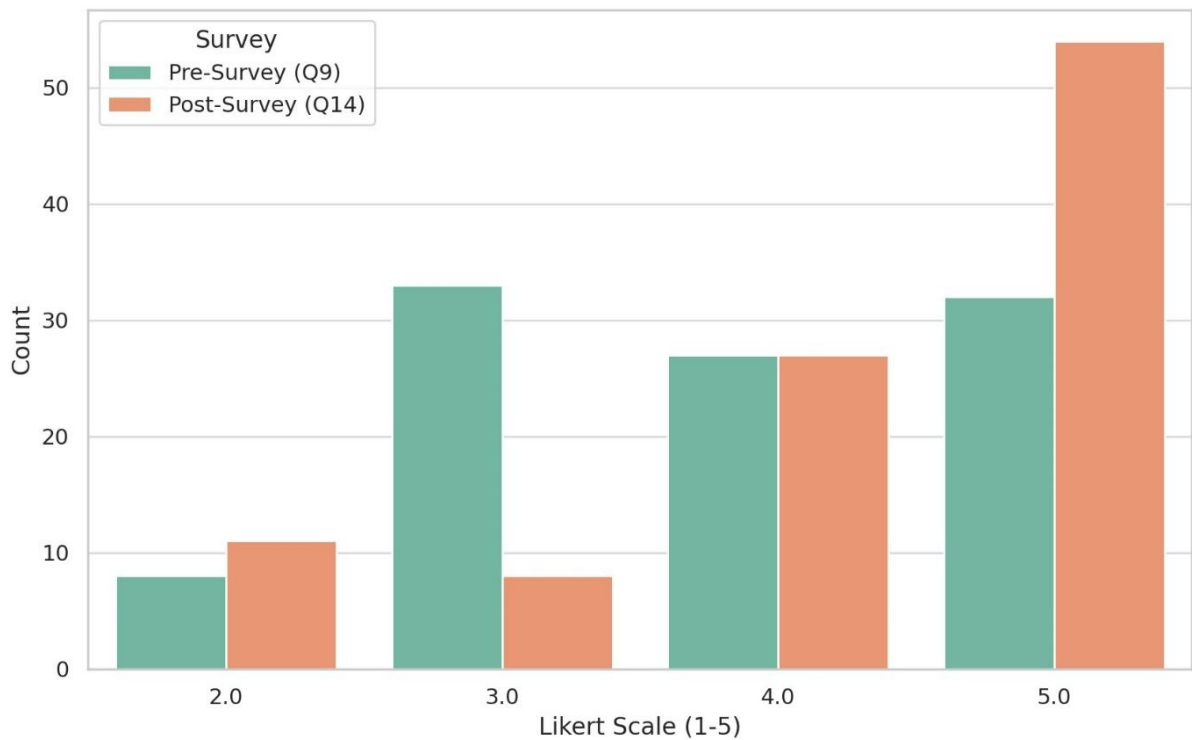
### Quantitative Data

Of the 113 students, 4 did not attend the rural immersion but were required to participate in all preparatory sessions and post-immersion reflections. These students completed an alternative assessment in place of the group presentation. A total of 102 students completed both the pre- and post-surveys. One student did not provide consent to participate in the study, and their responses were excluded from the analysis, leaving a final sample of 101 participants for analysis.

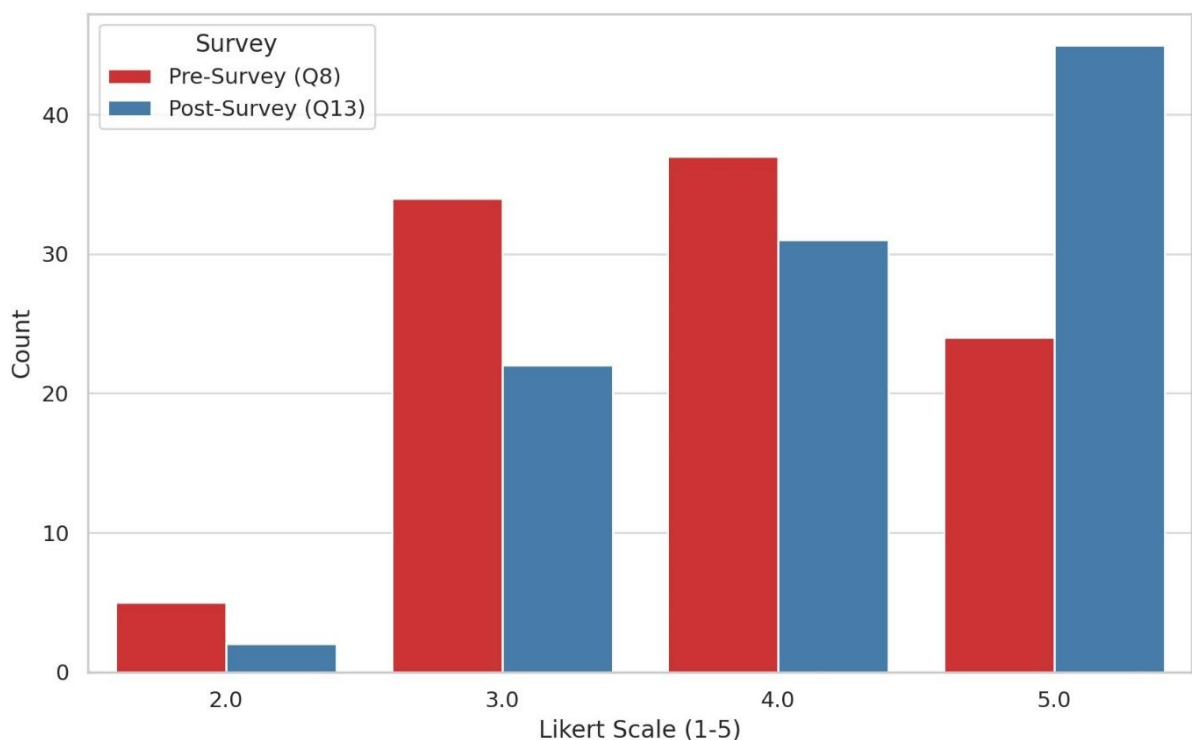
Descriptive statistics were used to summarize students' intentions regarding rural practice and clinical placements before and after the rural immersion week. As illustrated in Figure 1, the distribution of responses on the Likert scale shows a notable shift in students' intentions to apply to Rural Clinical School after attending the immersion. Similarly, Figure 2 presents descriptive statistics for students' intentions to work rurally. The post-survey results show an increase in the highest Likert scale rating, suggesting a greater inclination to consider rural practice. These descriptive statistics reflect a positive shift in students' attitudes toward rural healthcare, aligning with the program's goals of promoting rural practice through experiential learning.

Further inferential analysis, using a paired t-test, confirmed that these observed changes were statistically significant, indicating that the immersion week had a meaningful impact on students' intentions regarding rural practice and clinical placements. The analysis treated the Likert scale responses as a continuous variable, allowing for a more nuanced assessment of shifts in students' intentions. The paired t-test results showed a significant increase in the mean Likert scale ratings from pre- to post-survey for both outcomes. Specifically, students' intention to apply to a Rural Clinical School increased from a pre-survey mean of 3.80 (SD = 1.01) to a post-survey mean of 4.21 (SD = 1.05),  $t(100) = -4.93$ ,  $p < .001$ , with a medium effect size (Cohen's  $d = -0.49$ ). Similarly, their intention to work rurally improved significantly, with the mean Likert scale ratings rising from 3.77 (SD = 0.90) pre-survey to 4.16 (SD = 0.90) post-survey,  $t(100) = -5.61$ ,  $p < .001$ , and a medium effect size (Cohen's  $d = -0.56$ ). These results underscore the substantial influence of the Rural Immersion Week on fostering students' interest in rural practice and education.

**Figure 1: Descriptive Statistics for Students' Intentions to Apply to Rural Clinical School Before and After the Rural Immersion Week (Likert Scale: 1 = Strongly Disagree, 2 = Somewhat Disagree, 3 = Neutral, 4 = Somewhat Agree, 5 = Strongly Agree)**



**Figure 2: Descriptive Statistics for the Distribution of Students' Intentions to Work Rurally Before and After the Rural Immersion Week (Likert Scale: 1 = Strongly Disagree, 2 = Somewhat Disagree, 3 = Neutral, 4 = Somewhat Agree, 5 = Strongly Agree)**





## Qualitative Data

Thematic analysis of the qualitative survey responses revealed six common themes: *community*, *learning*, *challenges*, *personal growth*, *uncertainty*, and *no impact*. To support clarity and interpretation, Table 1 presents the coding framework used in this study, including each theme's definition and how it relates to key concepts within Mezirow's Transformative Learning Theory. The inclusion of *no impact* acknowledges that not all students experienced meaningful or lasting change, providing a necessary counterbalance to more transformative narratives and highlighting the varied nature of student experiences.

**Table 1: Qualitative Coding Framework: Themes, Definitions, and Alignment with Mezirow's Transformative Learning Theory**

Theme	Definition	Mapped Phase	Theoretical Link
<b>Community</b>	Connection with host families, peers, tutors, and locals; feelings of belonging, support and social integration.	Across all phases	Community acted as a relational context that supported transformation across all phases, providing emotional safety and enabling reflection and adaptation.
<b>Learning</b>	Gaining knowledge about rural health, Indigenous culture, or systemic challenges.	Critical Reflection	Demonstrates critical self-examination and reassessment of previously held assumptions; fosters awareness of social determinants and cultural complexity.
<b>Challenges</b>	Emotional, social, or logistical difficulties during immersion (e.g., fatigue, isolation).	Navigating Challenges	Reflects the process of trying out new roles and confronting discomfort; supports experiential learning and adaptive transformation.
<b>Personal Growth</b>	Reflections on increased empathy, confidence, humility, or desire to serve others.	Perspective Transformation, Personal Growth and Reintegration	Indicates shifts in values and professional identity; represents the learner internalising new perspectives and moving toward reintegration.
<b>Uncertainty</b>	Confusion, hesitation, or ambiguity about the impact of the immersion, often arising from experiences that challenged their prior expectations.	Disorienting Dilemmas	Represents the initial disruption of meaning perspectives; learners encounter new information or experiences that provoke cognitive dissonance but have not yet resolved or reframed their assumptions.
<b>No Impact</b>	Students express no change or relevance from the experience.	Outside Transformative Framework	Reflects absence of perspective shift; may represent resistance to change, lack of engagement, or experiences not triggering enough dissonance to prompt reflection.

**Disorienting Dilemmas: Uncertainty and Challenged Expectations.** Before the rural immersion, students anticipated the experience with both excitement and apprehension. Many looked forward to exploring the rural lifestyle, the strong community bonds typical of rural areas and learning about rural healthcare dynamics. However, some expressed concerns about

adapting to rural life, including challenges such as isolation, limited resources, and unfamiliar social settings.

The immersion week introduced students to the realities of rural healthcare, often contrasting with their initial assumptions. This contrast often generated a sense of uncertainty, as students began to question preconceived notions about rural health systems and community dynamics. Reflections revealed how immersion challenged expectations, particularly in relation to the role and resilience of rural healthcare providers. Students noted when asked about the interesting and significant aspect of doctors living and working rurally and the rural healthcare services:

*The town relies heavily on the doctor and the support and trust the community have for the doctors.*

*How passionate the staff seemed about their work.*

*They were quite resourceful than I thought.*

This initial contrast between expectations and on-the-ground realities aligns with Mezirow's concept of disorienting dilemmas, where students encountered scenarios that conflicted with their preconceived ideas about rural health.

**Critical Reflection: Developing Cultural and Social Awareness.** The immersion week encouraged students to engage in critical reflection, a key component of Mezirow's theory (Mezirow, 1997), where individuals re-examine their beliefs and assumptions in light of new experiences. Many students gained a deeper understanding of the healthcare challenges faced by Aboriginal communities, which provided them with a perspective on the social determinants of health in rural settings. The emphasis on cultural awareness, facilitated by interactions with Indigenous community members, was transformative for several participants.

This process was closely linked to the theme of learning, particularly in relation to understanding historical and systemic factors affecting Aboriginal health. Students frequently commented on how these interactions broadened their empathy and cultural competence, especially those students who went to the Marribank Mission in Katanning and Mogumber Mission in Moora. Marribank and Mogumber were historical missions in Western Australia, established as government-sanctioned sites where Aboriginal people were forcibly relocated and confined, often separating families and disrupting cultural practices. These missions are remembered as places of hardship and resilience, representing significant aspects of Aboriginal history, cultural loss, and the impact of colonial policies on Indigenous communities (Find and Connect Support Services, n.d.). As participants reflected:

*Their history is incredibly heartbreaking but it truly helped me to understand the idea of intergenerational trauma.*

*[I] Saw Marribank and it was incredible experience to learn firsthand of its impacts.*

This critical reflection fostered a heightened cultural awareness and an appreciation for the significance of cultural sensitivity in healthcare delivery.

**Perspective Transformation: Shifting Attitudes Toward Rural Life and Healthcare.** As a result of the immersion experience, many students experienced a shift in their perspectives on rural practice and rural life, which aligns with Mezirow's concept of perspective transformation (Mezirow, 1997). This phase represents a fundamental reorientation of the students' views and professional aspirations.

Many students reported an increased openness to rural living and healthcare careers. Their reflections, tied to the theme of personal growth, frequently expressed a re-evaluation of lifestyle preferences and a strengthened interest in rural work. Participants commented:



*I thought a slow-paced lifestyle would not suit me, but I found it to be a nice change from the city life.*

*Initially hesitant about similar experiences, I now appreciate and understand the possibility of living and working rurally, finding enjoyment in it.*

*Forming those connections [with community] makes you want to return.*

This transformative change reflects Mezirow's idea that individuals reshape their frames of reference, in this case, broadening their life and career aspirations to include rural practice.

**Navigating Challenges and Building Resilience.** Many students identified the logistical and social demands of the immersion week, such as long travel times, intensive scheduling, and limited downtime, as significant aspects of their experience. These challenges align with Mezirow's phase of trying on new roles and negotiating obstacles, where individuals engage in new ways of being and learn to overcome associated difficulties (Mezirow, 1997). For many, the week required them to stretch beyond their usual routines and adjust to new social and environmental dynamics. One student described this shift as an opportunity to grow socially, noting: *"It has allowed me to step out of my social comfort zone"*.

Students also described how engaging directly with rural environments helped them adapt to unfamiliar conditions and expectations, a central aspect of negotiating new roles in transformative learning. One participant captured this experience, stating: *"Rural week isn't something that can be fully grasped through textbooks; it's an experiential journey"*.

As students overcame the challenges, many described increased resilience, adaptability, and confidence in their ability to function in unfamiliar settings. One student reflected: *"The experience helped me realize my capability to thrive in a rural town, fostering a mindset of openness and appreciation for similar experiences."* Another added: *"I've learned that I have a genuine passion for rural health and contributing to balance the negativism in those areas"*.

These reflections illustrate how the act of working through discomfort and unfamiliarity supported students' development of practical resilience, self-awareness, and an emerging sense of professional identity, all key elements of transformative learning.

**Personal Growth and Empowerment: Increased Empathy and Commitment to Service.**

Reflecting on the overall experience, many students described the immersion week as a period of profound personal and professional growth. This outcome aligns not only with Mezirow's reintegration phase, where learners incorporate new values into their self-concept and future practice, but also with perspective transformation, which involves a fundamental shift in worldview and identity. In this study, personal growth emerged as both a central theme in student reflections and a representation of these final stages of transformative learning.

Through direct engagement with rural communities, students developed a deeper empathy and appreciation for rural life, with one student sharing: *"More understanding of rural health and life helps me better interact with rural patients"*.

Some students described how the immersion clarified their career goals, particularly in relation to rural practice. As one participant noted it: *"Helped establish my ideas of wanting to work rurally in the future."* Others described how the week challenged their emotional and ethical perspectives:

*It has made me more kind and compassionate to farmers.*

*It has humbled me down.*

These reflections show how empathy and respect for rural communities became integrated into students' evolving professional identities. One student reflected on the fulfilment gained from their involvement, stating: *"I think the feeling of contributing to the community is very rewarding."*

Others described more abstract or emotional impacts:

*[It] increased my beliefs in humanity.*

*The rural week opened up a different lifestyle that I appreciate.*

This stage of transformative learning demonstrates how students not only acquired new perspectives, but internalised them, fostering a stronger commitment to rural health and an appreciation for diversity, resilience, and community.

**The Enabling Role of Community.** Across the phases of transformation, the theme of *Community*, expressed through relationships with host families, peers, tutors, and rural residents, was not confined to a single stage, but instead served as a consistent enabler of learning and reflection. These interpersonal connections helped students feel supported as they encountered disorienting dilemmas, adapted to unfamiliar environments, and re-evaluated their assumptions. Strong connections with peers, tutors, and host families became an essential support system in navigating these challenges. Students shared:

*My connection with my peers, tutors, and host families grew very strong and deep.*

*I have gained more peers that I am close with.*

The emotional safety and sense of belonging that emerged from these relationships provided the foundation for many students' transformative experiences. Community, in this sense, functioned not as a separate phase, but as the relational context that supported transformation across all phases.

In summary, in alignment with Mezirow's Transformative Learning Theory, the Rural Immersion Week prompted students to encounter disorienting dilemmas, engage in critical reflection, undergo perspective transformation, and ultimately experience personal growth. These stages, facilitated by meaningful interactions with rural communities, helped students broaden their empathy, deepen their cultural understanding, and consider rural healthcare as a viable career path.

While many students reported shifts in perspective and personal growth consistent with transformative learning, not all participants experienced the immersion in this way. A small number of students indicated minimal or no change in their views, captured under the theme *No Impact*. These responses did not map onto Mezirow's phases but were included to reflect the diversity of student engagement. Their presence underscores that transformation is not guaranteed and may depend on individual readiness, context, or the nature of the immersion experience.

## Discussion

The results of this study indicate that the Rural Immersion Week significantly influenced students' intentions to pursue future rural clinical placements and consider rural practice as a career path. Descriptive statistics revealed an increase in students' positive responses toward working in rural settings and applying to rural clinical schools in the post-survey. Paired t-test results further confirmed that these shifts were statistically significant, suggesting that the immersive experience successfully promoted interest in rural healthcare, aligning with the program's objectives.

These findings are consistent with studies demonstrating the positive impact of rural immersion experiences on medical students' career intentions. For instance, Wright et al. found that a three-week rural program led to a positive shift in students' attitudes toward practicing in rural areas (Wright et al., 2014). Similarly, health professional students' participation in short, compulsory placement in Tasmania, led to an increased intention to pursue rural work (Dalton et al., 2008).

These studies, alongside our findings, underscore the value of short rural immersion as an effective strategy for addressing healthcare workforce shortages in rural areas by inspiring students to consider rural careers.

However, it is essential to acknowledge that not all studies have reported positive impacts of short rural immersion experiences. Abid et al. reported that, in contrast to extended placements, short rural immersion programs in New Zealand had no significant impact on health science students' intentions to work in rural areas (Abid et al., 2020).

Some research suggests that the initial boost in interest for rural practice may wane over time. A review found no long-term positive impact of rural clinical placement experiences on rural practice; however, they indicated it was likely due in part to the limited number of longitudinal studies on the topic (Seaman et al., 2022). Similarly, some studies reported that some students returned from rural placements with reinforced negative perceptions, particularly if they encountered challenging conditions, such as financial stress, professional isolation, or poor quality of supervision, that made rural practice seem less desirable (Bradley et al., 2020; Smith et al., 2018).

The transformative impact observed in this study can be understood through Mezirow's Transformative Learning Theory (Mezirow, 1997), with qualitative analysis providing insights into the depth of this transformation. Students experienced disorienting dilemmas and uncertainty as their assumptions about rural life and healthcare were challenged by firsthand exposure. This confrontation with new realities prompted critical reflection, particularly regarding cultural competence and the health impacts faced by Aboriginal communities. Learning about historical injustices and systemic challenges contributed to a deeper awareness of social determinants of health, fostering empathy and cultural sensitivity. The program also facilitated perspective transformation, a central component of Mezirow's theory, as students shifted their views on rural life and healthcare. This transformation was supported by the theme of personal growth and enabled through the strong sense of community experienced during the immersion. Interactions with host families, tutors, and peers provided a relational context that helped students adapt, reflect, and reframe their assumptions. Community, in this sense, acted as a mechanism for change across all phases of learning. While many students described a deepened commitment to rural health, a small number reported little or no change, highlighting that transformative learning is not universal and may depend on individual engagement or readiness.

Despite these promising results, this study has limitations. The reliance on self-reported data in surveys may introduce response bias, as students might feel inclined to provide favourable responses in the post-survey. Additionally, the study focused on a single cohort from Curtin Medical School, which may limit the generalizability of the findings to other medical programs. While information on students' rural or metropolitan backgrounds was collected, the sample size within each subgroup was not sufficient to support statistically robust comparisons. As such, the analysis focused on pre-post changes across the full cohort. The authors' involvement in designing and delivering the Rural Immersion Week may also introduce potential bias in interpreting student responses, though steps were taken to ensure reflexivity and consistency in data analysis. Further investigation with larger, stratified samples could examine whether background (e.g., rural vs metropolitan) influences the program's impact on student intentions. Longitudinal studies would also help determine whether initial interest in rural practice translates into long-term career decisions. Moreover, exploring the role of ongoing support and mentorship after rural placements could provide valuable insights into sustaining students' engagement with rural health.

In summary, the Rural Immersion Week demonstrates the transformative potential of experiential learning in shaping medical students' attitudes toward rural healthcare. While the findings are encouraging, it is important to consider that the positive effects observed may

require ongoing reinforcement. These findings, along with the broader literature, highlight the value of immersive rural experiences in cultivating empathetic, culturally competent healthcare providers committed to serving rural and underserved communities.

## Conclusion

This study shows that a short-term Rural Immersion Week can significantly increase medical students' interest in rural practice, fostering cultural competence and social responsibility. These findings support the inclusion of short immersive rural experiences in medical education as a strategy to address healthcare disparities in rural areas. Future research should explore the long-term effects of such programs on students' career choices.

## References

- Abid, Y., Connell, C. J., Sijnja, B., Verstappen, A. C., & Poole, P. (2020). National study of the impact of rural immersion programs on intended location of medical practice in New Zealand. *Rural & Remote Health*, 20(4), 4332. <https://www.rrh.org.au/journal/article/5785/files/1116/5785.html>
- Bradley, D., Bourke, L., & Cosgrave, C. (2020). Experiences of nursing and allied health students undertaking a rural placement : barriers and enablers to satisfaction and wellbeing. *Australian and International Journal of Rural Education*, 30(1), 51-63. <https://doi.org/10.47381/aijre.v30i1.239>
- Dalton, L. M., Routley, G. K., & Peek, K. J. (2008). Rural placements in Tasmania : do experiential placements and background influence undergraduate health science students' attitudes toward rural practice? *Rural and Remote Health*, 8(962), 1-11. <https://search.informit.org/doi/10.3316/aeipt.209619>
- Deutchman, M., Nearing, K., Baumgarten, B., & Westfall, J. (2012). Interdisciplinary rural immersion week. *Rural & Remote Health*, 12(2), 1-7. <https://www.rrh.org.au/journal/article/2045/files/1112/2045.html>
- Find and Connect Support Services. *History & information about Australian orphanages, Children's Homes & other institutions*. <https://www.findandconnect.gov.au/entity/mogumber/> ; <https://www.findandconnect.gov.au/entity/marribank/>
- Frenk, J., Chen, L., Bhutta, Z. A., Cohen, J., Crisp, N., Evans, T., Fineberg, H., Garcia, P., Ke, Y., Kelley, P., Kistnasamy, B., Meleis, A., Naylor, D., Pablos-Mendez, A., Reddy, S., Scrimshaw, S., Sepulveda, J., Serwadda, D., & Zurayk, H. (2010). Health professionals for a new century: transforming education to strengthen health systems in an interdependent world. *The Lancet*, 376(9756), 1923-1958. [https://doi.org/https://doi.org/10.1016/S0140-6736\(10\)61854-5](https://doi.org/https://doi.org/10.1016/S0140-6736(10)61854-5)
- Kitchenham, A. (2008). The Evolution of John Mezirow's Transformative Learning Theory. *Journal of Transformative Education*, 6(2), 104-123. <https://doi.org/10.1177/15413444608322678>
- Kumagai, A. K., & Lypton, M. L. (2009). Beyond Cultural Competence: Critical Consciousness, Social Justice, and Multicultural Education. *Academic Medicine*, 84(6), 782-787. <https://doi.org/10.1097/ACM.0b013e3181a42398>
- Mezirow, J. (1997). Transformative learning: theory to practice. *New Directions for Adult and Continuing Education*, 1997(74), 5-12. <https://doi.org/10.1002/ace.7401>

- Nyaradi, A., Solomons, T., & McNaught, K. (2025). Beyond the classroom: The Transformative Experience of Short Rural Immersion Programs for Health Professional Students: A Narrative Review. *Medical Education*, 59(7): 682-693. <https://doi.org/10.1111/medu.15612>
- Seaman, C. E., Green, E., & Freire, K. (2022). Effect of Rural Clinical Placements on Intention to Practice and Employment in Rural Australia: A Systematic Review. *International Journal of Environmental Research and Public Health*, 19(9), 5363. <https://doi.org/10.3390/ijerph19095363>
- Seelig, J. L. (2021). Place anonymization as rural erasure? A methodological inquiry for rural qualitative scholars. *International Journal of Qualitative Studies in Education*, 34(9), 857-870. <https://doi.org/10.1080/09518398.2021.1974971>
- Smith, T., Sutton, K., Pit, S., Muyambi, K., Terry, D., Farthing, A., Courtney, C., & Cross, M. (2018). Health professional students' rural placement satisfaction and rural practice intentions: a national cross-sectional survey. *Australian Journal of Rural Health*, 26(1), 26-32. <https://doi.org/10.1111/ajr.12375>
- Toussaint, S., & Mak, D. (2010). 'Even if we get one back here, it's worth it...': evaluation of an Australian Remote Area Health Placement Program. *Rural and Remote Health*, 10(3), 1546-1549. <https://doi.org/10.22605/RRH1546>
- Vujcich, D. L., Toussaint, S., & Mak, D. B. (2020). "[It's] more than just medicine": The value and sustainability of mandatory, non-clinical, short-term rural placements in a Western Australian medical school. *Medical Teacher*, 42(5), 543-549. <https://doi.org/10.1080/0142159X.2020.1713309>
- World Health Organization. (2020). Retention of the health workforce in rural and remote areas: A systematic review. WHO. <https://www.who.int/news/item/08-12-2020-retention-of-the-health-workforce-in-rural-and-remote-areas-a-systematic-review>
- Wright, J. R., Bourke, L., Waite, C. J., Holden, T. A., Goodwin, J. M., Marmo, A. L., Wilson, M. L., Malcolm, H. E., & Pierce, D. (2014). A short-term rural placement can change metropolitan medical students' knowledge of, and attitudes to, rural practice. *Medical Journal of Australia*, 201(2), 106-108. <https://doi.org/10.5694/mja13.11329>

## Appendix 1: Pre-Survey



### Understanding the impact of the Curtin Medical Student Rural Immersion Week

Student name: \_\_\_\_\_

Student number. \_\_\_\_\_

*The purpose of this survey is to help us understand your current thinking about the Rural Immersion week experience. There are no 'correct answers' in this survey.*

*Completion of this survey is a requirement of the assessments for rural immersion week. The data will be de-identified and your identity will not be known to the researchers.*

*You may withhold your consent for your responses to the survey to be used for research purposes.*

Please tick the box below to provide consent for your responses to be used for research purposes:

☐

I have received information regarding the use of this survey for research purposes and had an opportunity to ask questions. I believe I understand the purpose, extent and possible risks of my involvement in this project and I voluntarily consent to take part.

1. Will this be your first experience of living in rural Australia?

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2. What you think might be the best aspect(s) of the rural immersion week?

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3. What concerns do you have about the rural immersion week?

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4. In what way do you think the rural immersion week might impact you as a person?

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5. In what way do you think the rural immersion week might impact on where you work as a doctor in the future?

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6. Did you apply to Curtin Medical School on the Equity Pathway?

No

☐

Yes

☐

7. Did you apply to Curtin Medical School as a rural origin student?

No

☐

Yes

☐

8. Are you considering working rurally as a doctor in the future?

Very unlikely

☐

Unlikely

☐

Neutral

☐

Likely

☐

Highly likely

☐

9. Are you thinking about applying for a Rural Clinical School placement in Year 4?

Very unlikely

☐

Unlikely

☐

Neutral

☐

Likely

☐

Highly likely

☐

10. Is there anything you would like to add?

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## Appendix 2: Post-Survey



### Understanding the impact of the Curtin Medical Student Rural Immersion Week

Student name: \_\_\_\_\_

Student number: \_\_\_\_\_

*The purpose of this survey is to help us understand your current thinking about the Rural Immersion week experience. There are no 'correct answers' in this survey.*

*Completion of this survey is a requirement of the assessments for rural immersion week. The data will be de-identified and your identity will not be known to the researchers. However, you may withhold your consent for your responses to the survey to be used for research purposes.*

Please tick the box below to provide consent for your responses to be used for research purposes:

☐ I have received information regarding the use of this survey for research purposes and had an opportunity to ask questions. I believe I understand the purpose, extent and possible risks of my involvement in this project and I voluntarily consent to take part.

1. Which town did you go to?

<input type="radio"/>	Brookton
<input type="radio"/>	Corrigin
<input type="radio"/>	Kondinin
<input type="radio"/>	Dalwallinu
<input type="radio"/>	Moora
<input type="radio"/>	Wongan Hills
<input type="radio"/>	Katanning

2. In terms of preparation for the rural immersion week, how much do you agree with the following:

	Strongly disagree	Somewhat disagree	Neutral	Somewhat agree	Strongly agree
I understood the purpose of the fieldtrip.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
I felt prepared for the experience.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

3. What was useful in the preparation for the fieldtrip? (Tick all that apply).

- ☐ Population-based study, specific to this programme
- ☐ Handbook, specific to this programme
- ☐ Blackboard site, specific to this programme
- ☐ Workshop briefing, specific to this programme
- ☐ Aboriginal Health workshop, specific to this programme

4. What could Curtin Medical School do differently/better in preparing students for the fieldtrip?

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5. Regarding the organisation of the fieldtrip, how much do you agree with the following:

	Strongly disagree	Somewhat disagree	Neutral	Somewhat agree	Strongly agree
Transport to and from was satisfactory	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
My billet hosts made me feel welcome	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
There was sufficient support available for me on the fieldtrip (e.g., presence of tutors, I knew who to contact if I had a problem, etc.)	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
I felt safe on the fieldtrip.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

6. In terms of your learning experiences, how much do you agree with the following:

	Strongly disagree	Somewhat disagree	Neutral	Somewhat agree	Strongly agree
I had a clear idea of what I needed to learn during the fieldtrip	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
The activities enabled me to meet the learning objectives	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
The learning experiences were sufficiently challenging	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
The learning experiences helped me to develop my understanding of important concepts	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Interaction with tutors and fellow students helped me to think critically.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

7. What did you find interesting or significant about doctors living and working in a rural setting?

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8. What was noteworthy (positive or otherwise) about rural healthcare services?

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9. What was noteworthy (positive or otherwise) regarding the Aboriginal community in your town (e.g., local history and health challenges)?

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10. Describe any experiences which were very memorable to you (for example, you contributed to some aspect of rural life or healthcare, you had a memorable interaction with a local, etc).

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11. What suggestions do you have for improving the fieldtrip?

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12. Did the social interactions with your peers, tutors, host and community influence your experience during the rural week? If yes, in what way?

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13. Are you considering working rurally as a doctor in the future?

Very unlikely	Unlikely	Neutral	Likely	Highly likely
<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

14. Are you thinking about applying for a Rural Clinical School placement in Year 4?

Very unlikely	Unlikely	Neutral	Likely	Highly likely
<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

15. What was the best aspect(s) of the rural immersion week?

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16. What was the worst aspect(s) about the rural immersion week?

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17. In social interactions with the rural community, were there instances where you could have done things differently or better? If yes, please explain.

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18. Did you learn something that contradicted what you knew, or an assumption you had, before Rural Immersion Week? If yes, please expand

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19. Do you feel that you contributed in some way to the local community?

No	Neutral	Yes
<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

20. Reflecting on your own experience, do you think students are more likely to return to a rural area if they feel they made a contribution to the community where they stayed?

No	Neutral	Yes
<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

Please comment here

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21. Has the rural week affected you as a person? If yes, in what way?

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22. Is there anything else you would like to add?

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