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Motives and Meanings of Herbal Medicine Use: A Qualitative Analysis of Communication and Social Influence

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ABSTRACT

Herbal medicine use in Indonesia is usually explained as clinically driven health behavior. This study instead treats it as a communicative accomplishment shaped by social networks, narrative persuasion, and digital media. It asks how efficacy and safety are socially constructed and how reference groups shape them. Sixty-two herbal medicine users in Bogor Regency, Bogor City, and East Jakarta participated starting from March 2025 to February 2026 through semi-structured in-depth interviews, one focus group discussion, and a key informant interview with a practising herbalist. Values coding identified dominant motives, and narrative analysis interpreted their justification. Efficacy and safety or naturalness dominated, followed by access, dissatisfaction with biomedical treatment, cost, and ease of preparation. Parents, relatives, and social media initiated use more often than doctors. Efficacy came from experiential testimony rather than biomedical evidence, while safety was inferred from a natural-equals-safe heuristic, with adverse reactions reinterpreted as detoxification. Credibility followed relational proximity before institutional position. Health interventions should enter the reference networks and narrative forms through which herbal remedies circulate. Findings suggest that trust and safety are assembled through source relationships, so digital literacy and harm reduction should work within channels.

Keywords: Herbal medicine, health communication, narrative persuasion, parasocial interaction, digital health influencers.

ABSTRAK

Penggunaan obat herbal di Indonesia biasanya dijelaskan sebagai perilaku kesehatan yang didorong secara klinis. Studi ini justru memandangnya sebagai pencapaian komunikatif yang dibentuk oleh jejaring sosial, persuasi naratif, dan media digital. Penelitian ini menanyakan bagaimana efektivitas dan keamanan secara sosial dikonstruksi, serta bagaimana kelompok referensi membentuknya. Enam puluh dua pengguna obat herbal di Kabupaten Bogor, Kota Bogor, dan Jakarta Timur berpartisipasi dimulai pada bulan Maret 2025 hingga Februari 2026 melalui wawancara mendalam semi-terstruktur, satu diskusi kelompok terfokus, dan satu wawancara informan kunci dengan seorang herbalis yang berpraktik. Kode nilai mengidentifikasi motif dominan, dan analisis naratif menafsirkan pembenarannya. Efektivitas dan keamanan atau kealamian mendominasi, diikuti oleh akses, ketidakpuasan terhadap pengobatan biomedis, biaya, dan kemudahan peracikan. Orang tua, kerabat, dan media sosial lebih sering memulai penggunaan dibandingkan dokter. Efektivitas diperoleh dari testimoni pengalaman alih-alih bukti biomedis, sementara keamanan disimpulkan

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dari heuristik alami sama dengan aman, dengan reaksi merugikan ditafsirkan ulang sebagai detoksifikasi. Kredibilitas mengikuti kedekatan relasional sebelum posisi institusional. Intervensi kesehatan sebaiknya memasuki jejaring referensi dan bentuk naratif tempat sirkulasi ramuan herbal. Temuan menunjukkan bahwa kepercayaan dan keselamatan dibangun melalui hubungan sumber, sehingga literasi digital dan pengurangan dampak buruk sebaiknya bekerja dalam saluran-saluran tersebut.

Kata Kunci: Obat herbal, komunikasi kesehatan, persuasi naratif, interaksi parasosial, influencer kesehatan digital.

INTRODUCTION

Herbal medicine has become a common element of everyday health management in many cultures across the globe, existing in a place somewhere between home remedy, cultural practice, and health care alternative. In Indonesia, where jamu is a tradition embedded in cultural identity and recognised by UNESCO as intangible cultural heritage, people boil leaves, mix roots or follow recipes forwarded through family messaging applications not necessarily because they reject biomedical care, but because herbal remedies feel familiar, accessible and crucially, (Estiasih et al., 2025; Surya et al., 2025). These health-seeking options are never just pharmaceutical choices. They're essentially communication events. It is contingent upon who proposes the remedy, how trust is built, what counts as evidence, and how risk is portrayed in daily language (Wang & Leng, 2025). Although dominant health behaviour theories, such as the Health Belief Model, suggest that health is what people pursue, they often do not account for how specific non-clinical evidence becomes persuasive, how narratives circulate through social networks or how digital platforms disrupt traditional ways of disseminating knowledge (Kite et al., 2023).

The phenomenon can be researched in a particularly rich setting such as Indonesia. Indonesia is very rich in biodiversity, second only to the Amazon rainforests, and possesses a wide range of native medicinal plants (Elfahmi et al., 2014). The Indonesian government has institutionalised herbal medicine by establishing three categories of regulations: jamu, standardised herbal medicines, and fitofarmaka, which are phytomedicines supported by clinical trial evidence (Harfiani et al., 2025). Despite modernisation and the expansion of biomedical healthcare, jamu remains prevalent across both rural and urban populations, and recent studies show increased consumption during the COVID-19 pandemic driven by perceived immunity boosting properties (Febriyanti et al., 2024). The healthcare system in Indonesia therefore operates as a pluralistic environment in which traditional and biomedical practices coexist. Recent research nevertheless indicates that Indonesian

medical doctors' understanding of herbal medicine remains limited, with many lacking confidence in prescribing herbal remedies despite recognising their cultural significance (Simatupang et al., 2025). This creates a communication gap in which patients may not disclose herbal medicine use to physicians, with potential safety consequences for herb and drug interactions.

The present study responds to a particular research gap, the requirement for an integrated, communication-focused explanation of herbal medicine usage that relates patterned reasons across instances to the meaning-building labour undertaken inside narratives. What is missing is not yet another inventory of reasons for the use of herbal remedies by people, but a closer look at how motives such as efficacy, safety, accessibility, cost and ease of preparation are made credible and actionable through communication, and in particular who delivers those messages, what counts as evidence within social networks, and how outcomes are narrated into proof (Michel et al., 2025).

Recent scholarship on digital health communication has documented the rise of social media influencers as hybrid credibility sources that combine institutional markers of expertise with relational authenticity derived from parasocial bonds (Kaðková et al., 2024). These influencers can promote both healthy attitudes and problematic health messaging, which creates particular challenges for public health authorities (Kaðková et al., 2025). In Indonesia, this phenomenon is exemplified by figures such as Dr. Zaidul Akbar, who has garnered a significant online audience by integrating Islamic principles with conventional herbal treatments (Ikhwan, 2023). The uncertainty lies in how these statistics are integrated into the habitual thought processes of typical users, and the communicative mechanism by which their advice is seen as validation.

Motives for Herbal Medicine Use and Their Communicative Residue

International research on complementary and alternative medicine has repeatedly identified a stable cluster of reasons for use: perceived effectiveness, perceived naturalness and safety, dissatisfaction with conventional care, affordability, and accessibility (Bishop & Lewith, 2010; Welz et al., 2018). A worldwide synthesis of 231 studies adds a comparative qualification to that cluster, since the weight of each reason varies by region, with social networks reported as a distinctive influence in Asian populations, affordability, access and tradition in African populations, and an internal health locus of control in European, Australian and South American populations (Tangkiatkumjai et al., 2020). That comparison matters for the present study, because it locates the communicative dimension of herbal medicine use at the centre of the

phenomenon in Asian settings rather than at its margins. In Indonesia, health-seeking behaviour is shaped by an additional layer of cultural legitimacy, since traditional medicine is institutionally recognised and socially normative rather than marginal (Febriyanti et al., 2024; Widayanti et al., 2020). This literature is informative about the distribution of motives, but it treats motives largely as individual attributes. What remains underexamined is the communicative process through which a motive becomes sayable, defensible, and transferable to others. The emphasis of this investigation is not in assessing public belief in the efficacy of herbal treatments, but in examining how claims of their effectiveness are communicated, supported, and propagated in discussions.

Elaboration Likelihood Model

The Elaboration Likelihood Model distinguishes between a central route (where the person considers the content of the argument) and a peripheral route (where judgments are based on heuristic cues, such as the attractiveness of the source, agreement or simple category rules) (Petty & Cacioppo, 1986; Siev et al., 2022). The elaboration process is driven by motivation and skill. In health care, these are often hindered by symptom urgency, lack of technical knowledge, and information overload (Lam et al., 2022). This paradigm is used to express the cognitive parameters in which naturalness is a surrogate for evidence, not a claim to be judged. The study is not predictive but interpretative and has analytical value: it makes clear what elements of the participants' testimonies work as argumentative moves and what work as shortcuts.

Narrative Transportation Theory

Narrative Transportation Theory posits that when a person is absorbed in a story by concentrating, visualising and feeling, this reduces counter-arguments and increases the acceptance of beliefs that are consistent with the story (Green & Brock, 2000). Meta-analytic evidence has shown that narrative communications are more effective and more durable than non-narrative communications regarding attitudes and behaviours (Oschatz & Marker, 2020). Scoping reviews have shown that narratives are increasingly used in health communication practice (Dudley et al., 2023). In present work, the theory explains the phenomenon of lay testimony outperforming clinical evidence in common reasoning: a good recovery narrative is not just bad evidence poorly processed, but a different kind of persuasive entity propagating well through social and digital channels.

Parasocial Interaction and the Operationalisation of Digital Authority

In early research, parasocial contact was described as the illusion of a face-to-face relationship between an audience member and a media performance, sustained by direct address, perceived responsiveness, and the performer's continuous availability (Horton & Wohl, 1956). Contemporary study distinguishes between parasocial interaction, an experience limited to the period of exposure, and parasocial relationship, a continuing relationship that evolves via repeated exposure (Dibble et al., 2016; Hoffner & Bond, 2022). This distinction matters analytically because the two constructs imply different persuasive pathways: the first supplies momentary engagement, the second supplies durable trust that can be converted into compliance. Because the present study analyses talk rather than administering psychometric scales, parasocial dynamics are treated as claims that participants make, not as measured states. We therefore operationalised parasocial authority through three narrative indicators, each of which was coded only when the participant's own words supplied the evidence: (1) perceived address and responsiveness, where the participant describes the influencer as speaking to people like them, using accessible language, or answering questions they had, which corresponds to parasocial interaction in the strict sense (Dibble et al., 2016), (2) accumulated familiarity, where the participant reports habitual, repeated exposure and refers to the figure with relational rather than institutional markers, indicating a parasocial relationship rather than a single episode of exposure (Hoffner & Bond, 2022) and (3) credibility transfer, where the participant converts the bond into a warrant for action, that is, cites the figure as the reason a specific remedy is trustworthy, which is the point at which parasocial closeness becomes persuasion (Kaðková et al., 2025; Wolf et al., 2026).

This three-part operationalisation allows the analysis to move beyond describing that an influencer was mentioned, toward specifying the communicative work the mention performs. It also clarifies the notion of the hybrid credibility source, which defined analytically as a figure whose authority claim rests simultaneously on an institutional credential, a relational bond of the kind captured by the first and second indicators, and a cultural or religious frame that aligns the advice with the audience's moral world (Kaðková et al., 2024; Michel et al., 2025).

Credibility Hierarchies in Pluralistic Health Systems

Meta-analytic evidence shows that only about a third of users disclose biologically based complementary therapies to their clinicians (Foley et al., 2019) and Indonesian evidence indicates that the reticence is mutual, since physicians themselves report limited

confidence in the area (Simatupang et al., 2025). Culturally sensitive, patient-centred models of care in low and middle-income settings have been proposed as a response (Cipta et al., 2024). Read together with the three theories above, this literature suggests a testable interpretive proposition that organises the present analysis: in pluralistic systems, credibility is allocated by relational proximity first and institutional position second, so that family members and parasocially close digital figures occupy the top of the hierarchy while clinicians occupy a consultative position lower down.

Accordingly, this study is guided by three research questions: (1) which motives do herbal medicine users invoke when accounting for their use, and how do these motives co-occur across cases; (2) how do users construct the meanings of effective, safe, and appropriate within their narratives, and how do they narrate outcomes into proof; and (3) how do reference groups, including family networks and digital health influencers, shape both the motives that are endorsed and the interpretive frames that participants use when evaluating herbal remedies?

This research enhances health communication theory by framing the adoption of herbal medicine as a communicative achievement rather than merely an individual health choice, illustrating the synergistic role of the Elaboration Likelihood Model, Narrative Transportation Theory, and parasocial interaction theory in complex healthcare settings. It fosters understanding of the social construction of credibility, where biomedical authority competes with personal experiences and digital influence. The findings significantly enhance the development of health communication strategies that are culturally attuned and that incorporate, rather than disregard, indigenous knowledge frameworks.

RESEARCH METHOD

Study Design

This study employed a qualitative interpretive design that combined semi-structured in-depth interviews, one focus group discussion, and a key informant interview with a practising herbalist, analysed through values coding and narrative thematic analysis (Creswell, 2014). The numerical summaries reported below are the product of quantitising, that is, counting coded qualitative categories in order to display their distribution across cases (Sandelowski et al., 2009). Quantitising remains internal to qualitative inquiry. It describes the corpus that was analysed and does not estimate parameters of any wider population, and the counts are therefore presented as descriptive case counts rather than as prevalence estimates.

The design was selected to address the study's core objective, namely to explain not only which motives are invoked in herbal medicine use, as patterns that can be summarised across cases, but also how those motives are given meaning in everyday talk, especially through reference groups and experiential accounts of outcomes.

Participant and Recruitment

Fieldwork was conducted between March 2025 and February 2026 in Bogor Regency and Bogor City, West Java, with a small number of cases in East Jakarta. Most participants lived in peri-urban and rural subdistricts of Bogor Regency, including Cibungbulang, Nanggung, Caringin, Cijeruk, Tenjolaya, Ciomas, Gunungsindur, Bojonggede, Cileungsi, and Citayam. The setting is therefore best characterised as a peri-urban corridor south of the Jakarta metropolitan area rather than as a group of urban centres, and this shapes both the accessibility of biomedical facilities and the availability of medicinal plants growing in domestic yards.

Sixty-two herbal medicine users took part. Sixty were interviewed individually and two participated only in a focus group discussion. The field register initially contained sixty-two individual interview entries, two of which were subsequently found to be duplicate records of participants already registered, so the individual interview corpus comprises sixty unique cases. Motive and reference source coding could be completed for fifty-seven of those sixty cases, while the remaining three lacked sufficient detail on the motive question and are retained in the descriptive account, but excluded from Tables 2 to 4. In addition to the sixty two users, the herbalist whose practice supplied part of the sample was interviewed as a key informant, since her account explains the treatment regime that the clinic recruited participants were describing. She is not counted as a case.

Inclusion criteria required participants to be adults aged 18 years or older, current or recent users of herbal medicine within the previous six months, able to give informed consent, and willing to discuss their experiences in Indonesian. Cognitive impairment that would preclude meaningful participation was the sole exclusion criterion. Recruitment proceeded through purposive and snowball sampling and continued until thematic saturation was reached, indicated by the absence of new motives or narrative patterns in the final five interviews.

Two recruitment channels were used in order to limit selection bias. Snowball recruitment among herbal medicine users in the community yielded 58 of the sixty individually interviewed cases, and recruitment through a herbalist practice in Bogor Regency yielded two. Two further users of the same practice took part in the focus group discussion only, so the clinic-linked group numbers four of the 62 participants. Community-recruited participants were interviewed in their homes, and clinic recruited participants at the practice.

Clinic-based recruitment carries an evident legitimacy bias, since people who attend a herbalist practice hold, by definition, a favourable prior orientation toward herbal treatment. Three measures were taken to make that bias visible rather than latent. First, recruitment channel was retained as a case attribute throughout coding, so that every count could be disaggregated. Second, recruitment channel was retained as a case attribute and the clinic-recruited accounts are examined separately in the Results, where they are shown to depart from the dominant pattern; because only a small number of cases came through that channel, they are compared qualitatively rather than distributionally. Third, the herbalist was not present during the individual interviews, which limits the risk of endorsement effects. The findings are consequently presented as an account of how committed herbal medicine users construct efficacy and safety, not as an estimate of prevalence in the general Indonesian population.

Sample Characteristics

Demographic characteristics of the sixty individually interviewed participants are presented in Table 1. The corpus included 41 women (68%) and 19 men (32%). Age was recorded for 58 participants and ranged from 20 to 75 years (mean 43.5, SD 14.1); the three-participants who took part only in the focus group discussion were aged 49 and 78. A small but analytically consequential group of accounts concerns treatment administered to a family member rather than to the speaker. Three participants described decisions taken on behalf of a child or a parent, and these cases are coded separately as proxy treatment because the communicative work of a caregiving decision differs from that of a decision about one's own body.

Table 1. Respondent Characteristics

Characteristic	n	%
Gender		
Female	41	68
Male	19	32
Age group		
20 to 30 years	14	23
31 to 40 years	7	12
41 to 50 years	18	30
51 to 60 years	18	30
Over 60 years	3	5
Unit of decision		
Self treatment	57	95
Proxy treatment for a family member	3	5
Recruitment channel		
Community snowball	58	95
Herbalist practice	3	5

Data Collection Procedures

Data were collected in Indonesian through three procedures. First, semi-structured in-depth interviews were conducted with individual users, lasting between 45 and 90 minutes (mean 62 minutes) and held either in participants' homes or at the herbalist practice, according to participant preference, in order to ensure comfort and privacy. Second, one focus group discussion was held on 22 January 2026 at the herbalist practice with three clinic recruited users and the herbalist present, moderated by the first author, in order to observe how efficacy and safety claims are negotiated between users rather than reported to an interviewer. Third, a key informant interview was conducted with the herbalist, covering her training, her diagnostic approach, her prescribing logic, and the dietary restrictions she imposes on patients. The interview protocol covered current and past herbal medicine use, sources of information and recommendation, decision-making processes for trying specific remedies, perceived effectiveness and outcomes, safety concerns and adverse experiences, communication with healthcare providers about herbal use, and the social networks influencing health decisions. Follow up probes encouraged participants to elaborate on specific episodes and to narrate how they had learned about, decided to try, and evaluated a remedy. All participants are identified by a register code in every analysis and written output. Codes follow the field register and therefore run from R01 to R62, with two codes retired because the entries they designated were found to duplicate participants already registered; a mapping key linking each code to its case is retained in the project file. Interviews and the focus group discussion were audio

recorded with permission and transcribed verbatim in Indonesian. Transcripts were checked against the recordings, and unclear passages were re-transcribed by consensus between two members of the research team.

Translation and Back Translation of Quotations

Transcripts were analysed in Indonesian in order to preserve linguistic nuance and cultural meaning. Only the excerpts reproduced in this article were rendered into English, and a back translation procedure was applied to each of them. A bilingual team member first produced an English version. A second bilingual member, who had not seen the Indonesian original, then back translated that English version into Indonesian. The back translation was analysed alongside the source transcript, and any inconsistencies in meaning, register, or religious language were addressed through conversation until the English phrase reflected the same illocutionary power as the original text. Terms without a reliable English translation, including *qadarallah* and *cocok*, were maintained in Indonesian and clarified in the accompanying text rather than converted.

Data Analysis

In the first phase of analysis, values coding was used to identify the explicit and implicit values, attitudes and beliefs behind participants' use of herbal medicine. Six motive codes were employed. Five were developed deductively from the complementary medicine literature and developed inductively during initial transcript review: M1 efficacy (understood as proven to work through experience), M2 safety or naturalness (understood as perceived to be safe, natural and free of side effects), M3 access (understood as easy to obtain locally), M4 cost (understood as affordable) and M5 preparation (understood as easy to prepare). A sixth code, M6 dissatisfaction with or harm from prior biomedical treatment, was added inductively after initial coding, because a recurring class of accounts attributed organ damage, dependency or unresolved symptoms to pharmaceutical treatment and could not be accommodated within M1 to M5. This category is well established in the international literature (Bishop & Lewith, 2010; Welz et al., 2018) and its omission from the initial codebook was an oversight which the enlarged corpus rendered untenable. All applicable motives were coded for each case, since they are not mutually exclusive, as well as the source credited with first suggesting or legitimising the remedy. Two researchers coded independently and disagreements were discussed until consensus was reached.

In the second phase, narrative analysis examined how participants constructed credibility, justified adoption, narrated safety and risk, and positioned biomedical care alongside informal advice. Analysis drew on Kleinman (2003) explanatory models framework and on narrative persuasion theory (Green & Brock, 2000; Oschatz & Marker, 2020). We attended to narrative structure, that is, how stories were organised in time; evaluative language, that is, how participants appraised outcomes; and causal attribution, that is, how they explained why a remedy worked or failed. Accounts involving digital figures were additionally coded against the three parasocial indicators specified in the theoretical framework, namely perceived address and responsiveness, accumulated familiarity, and credibility transfer. Excerpts were then selected to illustrate both dominant patterns and departures from them. In the third phase, pattern integration, the two phases were brought together at the interpretive stage through joint reading of the coded distributions and the narrative themes. Coded categories were tabulated as case counts using matrix coding. The column totals of the cross-tabulation in Table 4 exceed the corresponding totals in Table 2 for two codes, and the two cases responsible are identified beneath that table. The counts function solely as an economical description of how often a code appears in this corpus, while the narrative material carries the interpretive burden of explaining how those codes were produced in talk.

Trustworthiness

Credibility was supported by prolonged engagement across an eleven month fieldwork period, verbatim transcription, and independent double coding. Trustworthiness was bolstered by an audit trail consisting of the codebook, the mapping key that associates register codes with cases, coding choices, and analytical memoranda. Confirmability was explored through peer debriefing between the two coders and by intentionally seeking out cases that contradicted the dominant pattern, including participants who claimed a remedy was ineffective, those who reported adverse physical effects, and participants whose safety considerations were influenced by practitioner advice instead of botanical inference. Reflexively, the research team notes that its members hold communication science rather than clinical training, and that the analysis therefore treats claims about efficacy as objects of interpretation rather than as propositions to be adjudicated pharmacologically.

Ethical Considerations

All participants gave informed consent after receiving an explanation of the study’s purpose, their right to withdraw, and the handling of their data. Recordings and transcripts were stored in password-protected files, and all identifiers were replaced by codes before analysis.

RESULTS AND DISCUSSION

Motive Prevalence

Table 2 summarises the coded motive frequencies across the 57 fully coded cases. Two motives dominated the corpus. Efficacy claims (M1) were coded in 43 cases and safety or naturalness (M2) in 39 cases. The two frequently co-occurred, with 27 participants, close to half the coded corpus, invoking both an efficacy and a safety justification within the same account. Access (M3) and dissatisfaction with prior biomedical treatment (M6) formed a second tier, appearing in 16 and 12 cases respectively. Cost (M4) and ease of preparation (M5) appeared least often. It was crucial that no participant cited cost, access, or convenience as the solitary justification for use; the pragmatic motives were always accompanied by an efficacy or safety claim and, as a result, served as supplementary rather than primary justifications.

Table 2. Coded Motive Frequencies

Motive Code	Motive Description	n	%
M1	Efficacy (experiential proof)	43	75
M2	Safety or naturalness	39	68
M3	Access	16	28
M4	Cost	10	18
M5	Preparation	3	5
M6	Dissatisfaction with or harm from prior biomedical treatment	12	21

Note: Motives are not mutually exclusive, so the column totals exceed 57. M1 and M2 co -occurred in 27 cases.

Reference Groups and Communication Pathways

Table 3 delineates the range of sources attributed with the initial suggestion or legitimisation of herbal medicine application. Parents and parents-in-law constituted the foremost category, trailed by other relatives, and then by sources from social media and the internet. Taken together, the two family categories account for 31 of the 57 coded cases. Two further interpersonal categories that the earlier analysis had not distinguished

become visible once the corpus is enlarged, namely neighbours and spouses, and both matter analytically because they mark degrees of relational proximity that a single family category conceals. Doctors were rarely credited with initiating herbal medicine use, appearing in only three cases. Only one participant described adoption as entirely self initiated. Within this corpus, then, the decision ecology for herbal medicine is predominantly interpersonal, with digital mediation as a strong but secondary channel, and professional guidance at the margin.

A focused trend materialised within the digital sector. Dr. Zaidul Akbar, a medical doctor and Islamic academic who shares herbal advice via YouTube, Instagram, and Facebook, was mentioned in 3 out of 11 social media cases, rendering him the sole individual cited several times in the whole dataset. Individuals who referenced him characterised him as reliable due to his genuine medical credentials, as one who elucidates concepts in Islamic terminology, and as a provider of straightforward recipes. These three characterisations correspond exactly to the three elements of the hybrid credibility framework, specifically institutional credentials, cultural and religious significance, and practical availability.

Table 3. Sources Credited with Initiating Herbal Medicine Use

Reference Group	n	%
Parents and parents in law	18	30
Relatives	13	22
Social media and internet	11	18
Friends, colleagues, and superiors	8	13
Neighbours	4	7
Doctors	3	5
Spouse	2	3
Self initiated	1	2
Total mentions	60	100

Note: A case may credit more than one source, so the total number of mentions (60) exceeds the number of coded cases (57). Percentages are calculated on mentions.

Motives by Reference Group

The overall distribution of reference sources and motive codes is shown in table 4. The matrix is shown as a descriptive presentation of the number of cases with that code. With a purposively selected sample of 57 coded instances and many cells in the single digits, any test statistic would be difficult to interpret, and the table should be seen as a map of narrative concerns rather than as proof of differential relationship. Read in that spirit, four patterns are visible. First, family sources are the only category in which safety

claims slightly outnumber efficacy claims, which suggests that familial authority is invoked above all to warrant trust. Second, social media cases show the widest dispersion, combining efficacy narratives with practical guidance on access, cost, and preparation, which is consistent with the multimodal character of digital health content. Third, doctors, though seldom credited, appear exclusively alongside efficacy and safety claims and never alongside pragmatic ones. Fourth, and newly visible in the enlarged corpus, dissatisfaction with prior biomedical treatment is distributed across the interpersonal categories and is almost absent from the digital one. Complaints about pharmaceutical harm were voiced in face-to-face conversation rather than absorbed from digital content, which locates the delegitimation of biomedicine in the same interpersonal channels that carry the efficacy narratives.

Table 4. Motive Codes by Reference Source

Reference Group	M1 Efficacy	M2 Safety	M3 Access	M4 Cost	M5 Prep	M6 Prior harm
Parents and parents in law	14	15	6	4	1	5
Relatives	8	6	5	0	1	2
Social media and internet	8	6	3	2	1	2
Friends, colleagues, and superiors	7	5	0	2	0	1
Neighbours	3	4	0	1	0	1
Doctors	2	2	0	0	0	0
Spouse	2	1	1	0	0	0
Self initiated	1	1	1	1	0	1
Total	45	40	16	10	3	12

Narrative Themes and Meaning-Making

Narrative analysis revealed how motives were constructed through everyday communication. Five dominant themes emerged, the second of which has two components:

Theme 1: Efficacy as Experiential Proof

Participants established effectiveness through embodied sensation and inherited testimony rather than through clinical metrics. Efficacy narratives followed a consistent structure: an initial ailment, a suggestion from a trusted source, a period of trying the remedy, the noticing of bodily change, and continued use as confirmation. Because the

structure is portable, the resulting account can be retold to others as compact evidence. R02 (female, 45, treating her child's fever with shallot, *Allium cepa*, compresses) warranted her use by pointing not to her own body but to an inherited record of practice:

It has been passed down from my mother; shallot can help bring a fever down. I have used it often myself. (R02)

The warrant here combines two motives that were separated in the code book. At the same time, the use of the extended family is given as evidence of both efficacy and safety, showing that in lay thinking duration of use stands in for both efficacy testing and safety monitoring. Note that this is a proxy decision: the speaker is not reporting on her own body at all, but authorising a therapy for her child on the basis of a transferred family record. In these circumstances, the inherited narrative not only persuades the speaker; it enables her to act upon another. A similar deference to family authorisation appears in the account of R08 (male, 21, contusion), for whom the parental suggestion arrives as the resolution of a period of uncertainty:

Finally, my parents suggested using rice and galangal. (R08)

A different Indonesian version of the efficacy narrative incorporates a religious framing. R45 (female, 59, gastrointestinal problems) described a decoction of avocado leaves, assessing the outcome as a question of divine allocation and personal compatibility, rather than pharmaceutical action:

Qadarallah, it is suitable for my consumption. (R45)

The term *cocok*, translated here as *suitable*, is central to this evaluative frame. It enables a participant to give a remedy all the credit and yet acknowledge that it might not work for someone else such that a failure instance in the network is never disconfirming evidence. Thus efficacy and non efficacy are reconciled into one explanatory model.

Theme 2: Safety through the Natural Heuristic

The natural formula, when performed safely, acts as a formidable shortcut. Participants regularly differentiated between herbal solutions and pharmaceutical medications that were asserted to diminish symptoms or to have detrimental side effects. R58 (female, 52, diabetes mellitus) communicated the inference in its most streamlined expression, juxtaposing the two categories against each other:

Herbal medicine is safer and has no side effects. A doctor's medicine is chemical. It must have side effects. (R58)

This claim is constructed in a categorical manner rather than an empirical one. The source is considered a sufficient indicator of non-harmfulness, which disregards dosage, duration, manner of preparation, and simultaneous medications. The second phrase demonstrates that the inference functions in both directions concurrently: naturalness endorses the herb, and in the same process, chemical composition accuses the pharmaceutical.

The cohabitation of herbal and pharmaceutical treatment was raised in one corpus section, revealingly. Clinic recruited participants asked permission, not pharmacologically. One participant said her herbalist let her keep taking her cardiac medication as a reassurance, not an interaction evaluation. Thus, practitioner authorisation settles coexistence, never discussed with the prescribing physician. Outside the clinic subsample, including those who took both, the question did not arise.

Theme 2b: Adverse Reaction Reinterpreted as Detoxification

The natural-equals-safe heuristic does not collapse when the body responds badly. It is repaired. Two accounts describe reactions that would ordinarily count as evidence against a remedy, and in both the reaction is converted into evidence for it. R24 (female, 75, hyperthyroidism), who took a compounded powder of seventeen plants prescribed by a herbalist, developed urticaria across her arms after her first doses. She reported the reaction to the herbalist and received an interpretation rather than a dose adjustment, namely that the eruption was a form of detoxification. The rash later subsided, and in her account that sequence confirms the interpretation.

A more severe instance appears in the focus group. A male participant (49, gout and diabetes mellitus) described three days during which he could not get out of bed, with diarrhoea occurring as often as thirteen times in a single day. He narrated the episode as a contest inside his body and closed it with the outcome that follows:

It was the medicine and the disease fighting each other. After three days, I tell you truly, my body felt light, it felt good.

Two features of this move deserve emphasis. First, the interpretation is supplied by the practitioner and adopted by the user, so the repair of the heuristic is itself an act of communication rather than a private cognitive adjustment. Second, the reinterpretation shares its logic with the suitability idiom analysed above. Where *cocok* makes a failure elsewhere in the network non disconfirming, the detoxification frame makes a failure in one's own body non disconfirming, since the harm is recast as the visible operation of the cure. Between them the two devices close the remaining routes by which experience could tell against a remedy. This has a direct practical consequence: safety messaging that asks users to watch for adverse reactions presumes that such reactions will be read as warnings, whereas in this corpus a ready made interpretive frame stands available to read them as progress.

Theme 3: Authority through Proximity and Parasocial Connection

Two distinct routes to credibility were evident. The first runs through physical and biographical proximity. Family members were credited with authority because they had observed the participant's body over time and had themselves lived through the condition. R13 (female, 43, hypertension) combined both warrants:

My parents recommended it, because from their experience too it had a good effect. That is why I believed it straight away and tried it. (R13)

The second route runs through mediated intimacy. R52 (male, 47, persistent toothache that had not resolved after both over the counter medication and a dental consultation) turned to a single clove of garlic on the strength of who had recommended it:

I tried that advice because dr. Zaidul Akbar is known as a herbal expert. Besides, I believe in the principle that food with good nutrition is better than chemical medicines. (R52)

He glossed the principle in an aphorism attributed to the same figure, to the effect that one should make food into medicine rather than making medicine into food. R15 (female, 25, menstrual pain), who managed her symptoms with turmeric, ginger, and lemongrass, described the same route in similar terms, reporting that she had obtained the recipe from this figure's social media accounts because he is a health expert who regularly shares herbal preparations. Coded against the three parasocial indicators, these accounts display all three components. Perceived address is present in the description of a figure who shares recipes with an audience that includes the participant and who explains matters in terms the participant recognises. Accumulated familiarity is present in the habitual framing of regularly shares, which positions the exposure as ongoing rather than singular. The transfer of credibility is evident in the critical decision, where the identity of the source, instead of any attribute of garlic or turmeric, serves as the basis for endorsement. The consistent structure is evident in the three cases that refer to this figure, and in R52, it is linked to a moral principle that broadens the rationale beyond a specific cure. What is communicated is not medical information but reputation: the participant is not assured of the recipe's effectiveness, but rather of the reliability of the source, which bestows faith upon the recipe.

Theme 4: Pluralistic Care Trajectories

The utilisation of herbal remedies hardly supplanted biomedical treatment. It was frequently applied in conjunction, initially utilised for trivial issues and maintained with medical intervention for significant conditions. R48 (female, 20, influenza and sore throat) articulated the minimal threshold for the activation of the initial layer, along with the principle that dictates escalation:

This flu business is routine, so I always try what can be done at home first. Only if there is no change do I go to the doctor. (R48)

This formulation is of analytical importance. When a cure is perceived to involve neither cost nor danger, no consideration is needed and the decision to employ it is not regarded as a health decision at all; the clinic is reserved for the failure of the first layer, rather than being consulted about it. A similar story shows that the layering can operate in the reverse, too. R06 (female, 28, influenza) was previously treated with prescribed drugs and first refused her husband's recommendation of a herbal mixture with ginger, cardamom, lemongrass and palm sugar, precisely because pharmaceutical treatment was speedier. She only converted after repeated use. She expressly put the trade-off as speed

vs adverse effects . Here, rather, it is not the absence of decision but a comparison carried out over time that leads to adoption and it is worth documenting since it qualifies the impression that herbal use is always frictionless. At the less severe end of the scale, R39 (female, 25, tumour) was able to maintain both systems in parallel. Her herbal regimen, coconut water, had been prescribed by a professor who had introduced her to an electro capacitive cancer therapy device:

Every day I drink coconut water three times, 300 millilitres each. The total is about two litres a day. (R39)

The maths of this account does not add up. Three pieces of 300 millilitres makes 900 millilitres, not two litres. This contradiction is presented here as speech because it is informative in itself, quantity is recounted as a marker of commitment to the regimen rather than a dose to be calculated, keeping with the general absence of dose reasoning recorded under Theme 2. This scenario further blurs the typical distinction between biomedical and traditional care, as the herbal component is passed down through a credentialed academic channel, rather than a lay network. Members of this pattern did not see themselves as selecting between two systems. They spoke of doing whatever seemed to help, a pragmatic pluralism reflecting the prevalence of many medical systems in the Indonesian healthcare scene (Febriyanti et al., 2024).

Theme 5: Prior Biomedical Harm as a Push Factor

The expanded corpus reveals a motive that was beyond the capability of the initial five code scheme. In twelve cases the adoption was not justified by what the natural therapy had delivered, but by what pharmaceutical treatment had cost. R57 (female, 52, hypertension, gout and high cholesterol) characterised herself as a traditional patient at the beginning, but her prescription medication did not work well, and thus she turned to herbal preparations. R60 (male, diabetes mellitus and hypertension) put the general principle plainly, that taking too much of the doctor's medicine is also not good for you. The most concrete account came from the focus group, where a male participant (49) attributed impaired kidney function to years of high-dose allopurinol prescribed for gout, and a second participant reported having been warned about the same risk by a relative who is a physician.

Two observations follow. First, this reasoning is grounded in exactly the same evidentiary form as the efficacy narratives analysed under Theme 1, namely a witnessed bodily sequence with a clear causal attribution. The narrative mechanism therefore runs in both directions: it builds trust in the herbal remedy and, using the same materials, dismantles trust in the prescription. Second, the delegitimizing account is transmitted interpersonally rather than digitally, as Table 4 shows, and in two of the cases above the warning originates from a clinician. The biomedical system is thus not only displaced from the top of the credibility hierarchy; in part it supplies the material by which its own standing is lowered.

A Disconfirming Pattern in the Clinic Subsample

The clinic's selected cases diverge from the prevailing norm in a manner that is educational rather than just troublesome. The herbalist consulted as a primary source does not see botanical origin as a definitive assurance of safety. She prescribes based on the patient's condition during the examination, emphasises that lifestyle and diet play a predominant role in treatment while the medication serves as a supplementary aid, and enforces dietary restrictions with such rigour that participants characterised her, with clear admiration, as stringent. In this subsample, safety is not deduced from the origin of a drug. It is enforced by a professional via regulations concerning dosage, scheduling, and restrictions.

The conceptual significance of this divergence is threefold. It suggests that the natural-equals-safe heuristic diminishes specifically in the presence of an authoritative figure who enforces adherence, so framing the heuristic as a substitute for lacking authority rather than as an unwavering conviction. It broadens the credibility ladder defined below, which would otherwise solely encompass family, internet influencers, and medical professionals, to incorporate the conventional practitioner. It transforms the legitimacy bias of clinic recruitment, recognised in the methodology section, from a constraint into a source of studied variability.

DISCUSSION

This study positioned herbal medicine use as a communicative accomplishment shaped by reference networks and narrative persuasion rather than as an individual health behaviour. Read against the international literature, the findings support five connected arguments, which are then drawn together as an integrated model in Figure 1.

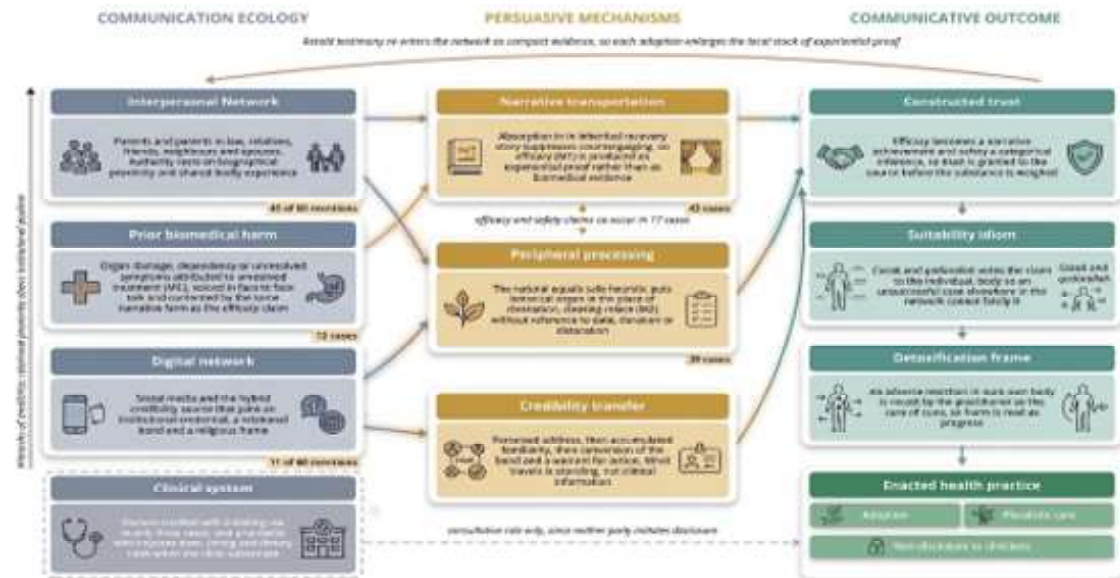


Figure 1. Communicative Construction of Trust and Safety in Herbal Medicine Use.

Efficacy as a Narrative Achievement

The prominence of efficacy and safety motives is consistent with global patterns of complementary medicine use (Bishop & Lewith, 2010; Welz et al., 2018). The contribution of a communication centred reading lies not in the ranking itself but in the account of how the top ranked motive is manufactured. In this corpus, efficacy was not a biomedical fact that participants had accepted; it was a narrative achievement, produced through stories with clear causal sequencing that leave little room for counterargument. This is precisely the mechanism specified by transportation theory, in which absorption in a well formed story suppresses the critical scrutiny that a bare claim would attract (Green & Brock, 2000). That narrative messages outperform non narrative messages on attitudes and behaviour, with effects persisting for months (Oschatz & Marker, 2020), makes the durability of these accounts intelligible.

Two features of the Indonesian material extend this literature. First, the efficacy narratives circulating here are not authored by the speaker but inherited, as in the appeal to a mother's decades of use. Transportation research has largely examined designed narratives delivered to audiences; what these data show is transportation into a family's accumulated story, where the narrator is also a character. Second, the idiom of *cocok*, or personal suitability, functions as a built in immunising device. Because the efficacy claim

is indexed to the individual body rather than to the substance, an unsuccessful case elsewhere in the network cannot falsify it. This is a communicative rather than a cognitive property, and it helps explain why corrective messaging that presents aggregate evidence so often fails to displace testimonial evidence.

Naturalness as Peripheral Processing

The safety heuristic observed here operated in the manner the Elaboration Likelihood Model describes as peripheral processing (Petty & Cacioppo, 1986; Siev et al., 2022). When motivation or ability to evaluate a claim is limited, judgement is delegated to a cue, and in this corpus the cue was botanical origin (Lam et al., 2022). Systematic review evidence indicates that this is not an Indonesian peculiarity: users anchored on naturalness routinely disregard interaction risk (Dores et al., 2023). Experimental work with American, Canadian and Chinese samples shows that the preference for natural over synthetic remedies crosses cultural boundaries and is mediated by perceived safety rather than by perceived efficacy (Ji et al., 2023) and recent reviews treat the natural is better belief as a general bias with direct consequences for medical decision-making (Meier et al., 2026). What the present material adds is the communicative form the bias takes, since the heuristic is not merely held privately but is offered to others as a complete safety argument. The practical implication is that public health communication cannot assume systematic evaluation as its default audience state. A message that presents balanced evidence about a herb and drug interaction is addressed to a central route that many recipients are not travelling. Messages that supply an equally simple competing cue, for example dose and duration rules embedded in the family idiom in which the remedy is already discussed (Suryandari & Holifah, 2022), are more likely to intercept the actual decision process.

The Hierarchy of Credibility and a Bidirectional Communication Gap

The distribution of reference sources reveals a credibility hierarchy in which relational proximity precedes institutional position. Doctors were credited with initiating use in only three of 57 coded cases, while family and digital sources together accounted for the large majority. This finding extends what is known about non disclosure. Meta analysis reports disclosure rates of roughly one third for biologically based complementary therapies, with the principal barriers being the absence of physician inquiry, anticipated disapproval, and the belief that physicians lack relevant knowledge (Duryatmo et al., 2024; Foley et al., 2019). Our results imply that the gap is not patient-generated but bidirectional. Indonesian physicians themselves report poor confidence in herbal

treatment, despite admitting its cultural value (Simatupang et al., 2025). The topic is not introduced by either party, silence is co-created and hence cannot be remediated by patient education alone.

Redefining the Credibility Hierarchy: The Case of a Hybrid Digital Authority

The concentration of mentions around a single digital figure warrants theoretical rather than merely descriptive treatment. Applying the three parasocial indicators specified earlier makes visible what the phenomenon consists of. Perceived address and accumulated familiarity establish a relationship of the kind Horton & Wohl (1956) first described and that later work separates into momentary interaction and durable bond (Dibble et al., 2016; Hoffner & Bond, 2022). Adoption is not the result of one of these alone. The crucial phase is the transfer of credibility, in which the bond is transformed into a warrant, so that the identity of the speaker supplants the features of the remedy as the foundation for the judgement.

This is the juncture where the case reassesses the established credibility hierarchy pertaining to health communication. Traditional credibility frameworks differentiate between competence and trustworthiness, regarding professional credentials as the main contributor to the former. The figure described by our participants supplies expertise, trustworthiness, and moral alignment simultaneously, and does so through a channel that also provides repetition and apparent responsiveness, which no clinical consultation can match. The result is not that professional authority has been rejected in favour of lay authority. It is that professional authority has been re-mediated: the credential is retained but relocated into a relational and religious frame where it acquires reach that the same credential does not have inside the clinic. Scoping reviews document the growing engagement of public health actors with influencers, while noting that evaluation of these partnerships remains thin (Michel et al., 2025) and cross cultural work on strategic influencer leadership shows that credentialed communicators can be highly effective precisely because their authenticity is legible to audiences (Wolf et al., 2026). The tension flagged in this literature, namely that experiential authority may be presented as equivalent to professional expertise (Kaòková et al., 2024), takes an unusual form here, because in this case the two are combined in the same person. Any intervention that treats the figure as a competitor to the health system therefore misidentifies the object.

Pluralism, Harm Reduction, and Platform Strategy

In contexts where evidence for a specific remedy is limited, people construct evidence from accumulated testimony and repeated trial (Widayanti et al., 2020). This is adaptive rather than irrational: narrative evidence fills the space that statistical evidence does not occupy (Dudley et al., 2023). The Indonesian setting amplifies the pattern, since jamu carries institutional recognition, cultural prestige, and economic weight, so that the legitimating structures differ fundamentally from those in settings where traditional medicine is marginal. Culturally sensitive, patient-centred approaches have been advocated for precisely such settings (Cipta et al., 2024).

Three practical consequences follow. First, prohibition-based messaging is both culturally inappropriate and ineffective. Evidence from adjacent fields shows that comprehensive harm reduction consistently outperforms prohibition (Colledge-Frisby et al., 2023) and the analogue for herbal medicine is guidance on contraindications, on interaction with prescribed drugs, and on when to escalate to formal care. Second, clinical encounters need to create a non-judgemental space for disclosure, since the silence documented above is jointly produced and only the clinician can unilaterally break it. Third, platform-level strategy matters, because algorithmic amplification of emotionally resonant content creates environments in which testimony circulates without quality control (Lorenz-Spreen et al., 2022) and correcting peer-delivered misinformation is markedly harder than correcting institutional messaging, with expert corrections outperforming non expert ones (Amelia et al., 2025; Borges Do Nascimento et al., 2022). Collaborating with reputable influencers to integrate safety advice within widely consumed content is a more viable approach than external correction, and research indicates that influencers may convey precise health information efficiently when appropriately involved (Bonnevie et al., 2020).

An Integrated Model of Communicative Trust Construction

The preceding assertions are not autonomous. Figure 1 illustrates their collaborative function within a communication process. The paradigm interprets information sequentially, beginning with the communication environment where a solution is proposed, progressing to the persuasive strategies that transform a suggestion into conviction, and culminating in the subsequent health practice. The research asserts that trust develops incrementally rather than being established through a singular assessment, with each phase dismantling a distinct obstacle to adoption.

Two separate mechanisms initiate the process, each performing a unique function. Narrative transmission bolsters the effectiveness assertion as a thoroughly articulated recovery narrative, frequently passed down from a progenitor, mitigates opposing arguments. The natural-equals-safe heuristic substitutes dose, duration, preparation, and concurrent medications with botanical origin, thereby allowing peripheral processing to ensure safety clearance. Efficacy and safety considerations were present in 27 narratives, constituting about half of the coded corpus, due to their complimentary nature. A narrative demonstrates the efficacy of the remedy, while a heuristic indicates that it is without cost. They disregard both aspects of health decision making. The third approach, credibility transmission, influences the source rather than the content. In digitally mediated contexts, the sense of address and familiarity fosters a connection, and the critical action transforms that relationship into a justification, whereby the speaker's identity, rather than turmeric or ginger, dictates the evaluation. The mechanism is linked to individuals, traversing the same interpersonal and digital pathways as narratives, thereby positioning the digital representation alongside the family. Dashed routes signify the clinical framework. It exists inside the care pathway but is seldom acknowledged for initiating usage or for subsequent enlightenment.

Two features of the model deserve emphasis for readers working in other settings. The first is the suitability idiom, shown as the stage at which constructed trust is stabilised. Because *cocok* indexes the efficacy claim to a particular body, an unsuccessful case elsewhere in the network cannot function as disconfirming evidence, so corrective messaging built on aggregate data is addressed to a claim that has already been placed beyond its reach. The second is the feedback path along the top of the figure. Every adoption that is judged successful is retold, so the stock of experiential proof available to the network grows with use. This gives the process a self-reinforcing character that static models of individual health decision making do not capture, and it suggests that the unit of analysis for intervention design is the network rather than the person.

Theoretical Implications

The study makes three theoretical contributions. It shows that the Elaboration Likelihood Model and Narrative Transportation Theory are not alternative explanations of herbal medicine adoption but sequential ones: transportation supplies the efficacy claim, while peripheral heuristics supply the safety clearance that permits the claim to be acted upon without further scrutiny. It specifies parasocial authority in operational terms suitable for qualitative data, distinguishing perceived address, accumulated familiarity, and credibility

transfer, and demonstrating that only the third is persuasive in the strict sense. And it identifies two mechanisms through which testimonial evidence is rendered locally unfalsifiable, namely the suitability idiom, which neutralises failure elsewhere in the network, and the detoxification frame, which neutralises failure in the user's own body. These are communicative rather than cognitive properties, and together they carry direct consequences for the design of corrective messaging, since the first places aggregate evidence beyond reach and the second does the same to the individual adverse event on which most safety messaging relies. A fourth contribution follows from the enlarged corpus: dissatisfaction with prior biomedical treatment operates through the same narrative form as the efficacy claim, so that a single evidentiary mechanism simultaneously constructs the credibility of the herbal remedy and erodes that of the prescription.

Limitations

Several limitations qualify these findings. The corpus of 62 participants was drawn from a single peri-urban corridor spanning Bogor Regency, Bogor City, and a small part of East Jakarta, and cannot represent Indonesia's regional and ethnic diversity. Motive coding could be completed for 57 of the 60 individually interviewed cases, so Tables 2 to 4 rest on a slightly smaller base than the corpus as a whole. Recruitment via a herbalist practice clinic engenders a legitimacy bias that has been candidly documented in the methodology section, yet cannot be eradicated solely through disclosure: participants drawn from this environment are inherently predisposed to favour herbal remedies, thus the study elucidates the reasoning of dedicated users rather than the behaviours of the broader populace.

The design is retrospective and cross sectional, so accounts are subject to recall and rationalisation bias, and no causal claim can be made about the relationship between reference sources and motives. The counts reported in Tables 2 to 4 are descriptions of this corpus and were not subjected to inferential testing, which is a deliberate constraint rather than an omission. The prominence of one digital figure may be time specific, since patterns of digital influence shift rapidly, and in the enlarged corpus that figure was named in three cases rather than dominating the digital category as the smaller corpus had suggested. Finally, the focus on communication brackets clinical questions about actual interactions, contraindications, and safety profiles, which require pharmacovigilance research rather than interview data.

Directions for Future Research

Longitudinal network analysis would allow the circulation of herbal medicine information to be traced over time, showing who validates a claim and at what point in an illness episode different sources are consulted. Digital ethnography could analyse how influencers build their authority and whether safety information circulates through the same avenues as efficacy narratives. Research should investigate if harm reduction communication that considers underlying motives and establishes safety limits surpasses prohibition messaging. Engaging in comparative analysis across Southeast Asia would clarify whether the identified patterns align with regional conventions or are unique to certain nations. In conclusion, creating measures that gauge how individuals perceive the effectiveness of herbs through experiential signs would facilitate a more sophisticated analysis of decision quality than existing methodologies allow.

CONCLUSION

The three research questions can now be answered in analytic rather than descriptive terms. Motives are not a menu of separate reasons from which users select. Efficacy and safety or naturalness dominated the corpus, and the finding that carries theoretical weight is their co-occurrence in 27 of the 57 coded accounts, because efficacy is established through a story and safety through a heuristic, so that a narrative mechanism and a peripheral mechanism combine to produce a decision that demands no deliberation at all. Cost, access and ease of preparation never appeared as sole justifications, which indicates that pragmatic considerations modulate a choice that has already been warranted rather than motivating it, while a sixth motive, dissatisfaction with or harm from prior biomedical treatment, is warranted by the same narrative form as the efficacy claim, so that a single evidentiary mechanism does two opposing jobs at once. The meanings of effective, safe and appropriate are constructed through operations that the analysis can now separate. Effectiveness is a narrative achievement, frequently inherited rather than authored, so that transportation occurs into a family history in which the narrator is also a character; safety is a categorical inference from origin, which removes dose, duration and concurrent medication from view and survives contrary bodily evidence because an adverse reaction can be reinterpreted as detoxification; and appropriateness is settled by the suitability idiom, since *cocok* indexes the claim to an individual body, so that a failed case elsewhere in the network cannot count against the remedy. Testimonial evidence is therefore locally unfalsifiable rather than merely weaker than aggregate evidence. Reference groups, finally, do not simply relay recommendations but allocate

credibility, and the allocation follows relational proximity before institutional position, so that professional authority is not rejected but re-mediated into a relational and religious frame that gives the credential a reach it does not have inside the clinic.

Taken together, these answers shift the theoretical account of trust and safety in health communication, and three empirical patterns carry that shift. The co-occurrence of efficacy and naturalness heuristics in half the coded corpus shows that trust is not delivered by a single judgement but assembled from two distinct routes at once, a narrative one that supplies the efficacy claim and a peripheral one that supplies the safety clearance, so that deliberation is dissolved from both sides before it can occur. The operationalisation of credibility transfer shows that parasocial closeness becomes persuasive only at the moment it is explicitly converted into a warrant for a specific remedy, which relocates professional authority into a relational and religious frame rather than displacing it, and which gives health communication theory a mechanism for hybrid credibility that source models built on expertise and trustworthiness alone cannot supply. Moreover, the pluralistic care trajectories evident in the reference group data, in which family, digital, and clinical sources are drawn on selectively rather than exclusively, indicate that safety is negotiated across a plural field of reference groups rather than delegated to any single credentialed source, which is the pattern of a purely biomedical account of disclosure and compliance would miss. Trust is therefore assembled sequentially rather than assessed, through a source relationship that precedes any evaluation of the substance itself; safety is a communicative rather than a pharmacological category, cleared by inference from origin at precisely the point where evaluation would otherwise occur; and credibility behaves as a property of the network rather than as an attribute of the speaker alone, since every adoption that is judged successful is retold and thereby enlarges the stock of experiential proof on which later adoptions draw. What is specific to this corpus is not the naturalness bias itself, which experimental work reports across cultures, but the communicative architecture that makes it durable. Three consequences follow for practice, and they concern digital health literacy and harm reduction rather than correction. Interventions should supply the boundary conditions that the heuristic removes, namely dose, duration, interaction and the point at which formal care becomes necessary, phrased in the family idiom in which remedies are already discussed. Clinical encounters should open the subject through routine and non-judgemental inquiry, because only the clinician can unilaterally break a silence that both parties maintain. Platform strategies should work with credentialed communicators to embed safety guidance inside content that keeps its narrative form, since correction from outside the network competes with

testimony on unfavourable terms. As healthcare systems worldwide become more pluralistic, the communicative construction of trust is where safety is won or lost, and health communication research is better placed to examine that construction than to assume it away.

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Data availability. De-identified transcripts and the coding matrix are available from the author on reasonable request, subject to the terms of participant consent.

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