Dementia in Focus: Interdisciplinary Research Tasks in Latvia

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Dementia is a characteristic symptom of several diseases, but mainly Alzheimer's disease. There are also characteristic manifestations of the disease in the affected person's use of language and communication with others. The social problems faced by people with dementia and their relatives are increasingly being highlighted in the Latvian public discourse. At the same time, the importance of this issue has been recognized in the fields of medicine and care. It can be concluded that a solution to dementia patient support requires cooperation between several disciplines of science at different levels, because individual institutional initiatives, although a positive endeavour, cannot fully contribute to the theoretical and practical solution of this complex problem in Latvia.

Keywords: dementia in public discourse, language and communication, dementia from a multidisciplinary perspective

Introduction. Alzheimer's disease and interdisciplinary research

Dementia has increasingly become a topic of concern in modern society. Dementia is a component of several conditions, primarily Alzheimer's disease, which damages the cerebral cortex and leads to brain atrophy. Sixty to eighty percent of all dementia cases are attributed to Alzheimer's disease [1]. In the online 2009 portal www.alzheimerinfo.de, Friederike Schmöe explains dementia, as follows:

nicht mehr eigenständig durchgeführt werden können. [2, p. 206]

Generic denomination for symptoms that are characterized by the loss of mental functions, such as thinking, remembering, orientation, linking of thought material; the result is that every day activities cannot be accomplished independently. Demenz ist der Oberbegriff für Erkrankungsbilder, die mit einem Verlust der geistigen Funktionen wie Denken, Erinnern, Orientierung und Verknüpfen von Denkinhalten einhergehen und die dazu führen, dass alltägliche Aktivitäten

This explanation corresponds to the definition of dementia published on the website of the Centre for Disease Prevention and Control of Latvia:

Disorders of brain functions that cause irreversible, increasing and diverse disorders of cognitive alias mental functions with result: changed capabilities of remembering, language, visual space perception, skills and ability to judge. [3]

Developmental stages of Alzheimer's disease are marked by specific symptoms, among them patients' use of language und communication skills. Without specialized expertise, it can be difficult to detect these deficits. For example, early stages are mostly characterized by reduced vocabulary and some pragmalinguistic imperfection, such as inadequate judgment of a situation, followed by communication mistakes: inappropriate length of speech, weak topical focus, problems with clause linkage and other symptoms, which are not always associated with mental disorders [2, p. 208]. Language disorders increase gradually. Initially, patients often try to conceal them. Non-experts can recognize serious deficits at the level of syntax during the moderate phase of Alzheimer's dementia, when the affected person is no longer able to understand specific questions or complex sentence structure, and uses clichés as answers [2, p. 208].

Hence, adequate linguistic expertise is vital not only for a timely diagnosis of the disease, but also for further treatment of patients; it involves medical professionals and caregivers, including family members and relatives. In countries with more established practices of interdisciplinary research concerning (Alzheimer's) dementia than in Latvia, there are appropriate fields of research established, e.g. clinical linguistics/Klinische Linguistik [2, p. 205] and literature studies are available. General guidelines (e. g., Dementia 2016) stress the aspects of communication related to diagnosis as well as to caregiving. For diagnostics: interviews with relatives and other involved persons - "key informant(s)"; cognitive tests, "utilizing culturally adapted tools if available" [4, p. 95]; distinguishing between dementia and depression/"Pseudodementia" by cognitive assessment [4, p. 96]. For caregiving: "provide regular orientation information (e.g. day, date, time, names of people) so that the person can remain oriented"; using and providing media updates to keep patients informed of daily news; "use simple short sentences to make verbal communication clear" [4, p. 101]. Thus, special attention is paid to the support of caregivers [4, p. 102].

Research indicate that dementia is expressed in impaired language use and limited communication abilities. Issues of individuals with dementia are centred around language as the basis for communication. Practitioners, physicians, therapists, as well as caregivers have to deal with language issues in communicating appropriately with a patient at different stages of dementia. The aforementioned issues are not only concerns related to the medical field and caregivers but also areas of communication in society and in legal matters.

Observations and conclusions of international specialized literature (cf. the chapter by Lele-Rozentāle in this monograph) emphasize opportunities for close cooperation between different fields of research (primarily medicine and linguistics) in order to optimize the treatment of persons affected by dementia (primarily Alzheimer's dementia), providing them with the necessary support to maintain a sustainable quality of life. The following part? gives a brief overview of several areas in which linguistics can play a key role in improving treatment of Alzheimer's dementia. Development of public discourse is lacking in this area, as well as the participation of linguists; furthermore, based on analysis of several representative guidelines, the necessity of including linguistics in medical practice is stressed. Finally, linguistics should be a component in design of instructional materials (respectively, in medical curricula) and in medical education as well as in the education of other professionals and of care givers.

1. Focusing on (Alzheimer's) dementia in the public discourse

The topic "dementia" is a focal point of concern in Latvian society from different points of view. There are questions that affect everyone, for example: how to detect early symptoms of dementia. Together with guidance regarding maintaining a healthy lifestyle, attention to the learning process and mental activity are important factors in activating and building new links between nerve cells (synapses) in the brain. Regardless of a person's educational level, learning and mental training as a process fosters improved brain capacity and can support – even if only temporarily – quality of life in the face of disease. Of crucial importance are linguistic activities to strengthen brain capacity. Linguistically speaking, these exercises affect relevant parts of communication in terms of receiving information, processing of information and authoring information. The psychiatrist Ieva Everte offers this advice:

read books and belles lettres; do crossword puzzles [...]; plan new routes for walks and excursions; learn foreign languages; [...] do mental arithmetic; play mental games – [...] such as Scrabble (formation of words using letters) and more [5].

At the same time, broader social issues related to vital health care practices arise in connection with dementia: How to ensure the timely diagnosis of dementia? How to improve statistical analysis of patients? What kinds of support are available for patients and their relatives, who are often their caregivers? How to approach legal issues related to persons with dementia? Do we offer adequate education or training for medicine staff and caregivers? Since 2014, the journalist Imants Frederiks Ozols has been examining these complex questions. He has detected at least 30,000 persons with dementia in Latvia who have inadequate diagnoses. Important social issues have not been considered in their treatment [6].

In a 2021 broadcast of Latvian Radio (LR1) "Atvērtie faili" (Open files), series Nr. 38 on the topic of dementia, Ozols takes up the aforementioned questions, embedding them in reports and interviews with the neurologist Guntis Karelis and psychiatrist Jānis Bušs [7, 8]. Among their observations, the interviewees pointed out that sometimes, the wrong specialist is chosen by patient managers, e.g. cardiologists or endocrinologists. Often, exact diagnosis and detection of Alzheimer's disease is made too late. For this reason, (personal) legal decisions are delayed, which can potentially leave a person with dementia vulnerable to criminals who may take advantage of their impaired mental state. In general, neurodegenerative diseases are not comprehensively treated in Latvia. The facts speak for themselves: patients lack standard guidelines regarding where to get help, which kind of specialists to consult; care is poorly delivered via brief training of unemployed persons; relatives can encounter formal obstacles in being appointed official caregivers in order to receive financial support and help with other problems. Finally, and from a public point of view, patients with dementia are still stigmatized [7, 8].

In addition to the above-mentioned issues, which address social issues in Latvia, patients and their family members are confronted with emotional issues of developing empathy and fostering a better understanding of problems of dementia. A recent exhibition "Dairy Diaries" in the Medicine History Museum (April 8–June 5, 2022), addresses these issues. Created by Anna Priedola, media artist and research assistant in the Art Research Laboratory of the University of Liepaja, the exhibition depicts dementia from the perspective of relatives of patients. A symbolically visualised fermentation of milk transforming into curd refers in all probability to the popular idiomatic phrase "biezpiens galvā" (Eng. literal translation: *curd in the head*), depicting a person's inability to behave properly in a situation, primarily cognitively [9]. The time-lapse movie is complemented by documentary material describing a dementia patient's relationships with loved ones – husband, father, spouse's father and spouse's mother – as the patient's cognitive abilities decrease over time. These emotional stories often mirror questions, which are taken up by I. F. Ozols [cf. 6, 7, 8].

2. Focusing on (Alzheimer's) dementia in medical treatment and caregiving

While diagnosis and treatment of patients in dementia are managed within the medical field, appropriate measures of treatment at different stages involve aspects of language use and communication (e.g., language perception and performance connected with memory, orientation, speech and writing, visual and spatial perception, understanding of causal relationship, ability to judge, communicative skills, arithmetic), which typically require linguistic expertise, as well as changes in personality, which reduce the capability to perform daily

activities (shopping, washing, dressing, cooking), etc. [10, p. 3]. Linguistic aspects of dementia are included in preventive advice, diagnostic tests, physician-patient communication, ergotherapy as well as in caregiving-patient interaction, etc. Linguistic aspects of treatment are reflected directly and indirectly in clinical treatment plans, specifically, in two guidelines — No. 28 of the Centre for Disease Prevention and Control of Latvia: "Klīniskie algoritmi" (Eng. Clinical Algorithms) [10], which deal with the topic of Alzheimer's dementia in general, as well as with potential solutions, and "Klīniskie (pacientu) ceļi" (Eng. Clinical Pathways) [11], which takes a closer look at social and medical management treatment plans. While both articles have a parallel content, in this article, attention is focused on language and communication aspects in connection with implementation of treatment protocols by general practitioners, medical specialists (e.g., neurologists, psychiatrists) and caregivers (currently – relatives). Upon a closer examination, the protocols reveal problematic situations in which linguistic expertise could potentially provide valuable assistance.

2.1. Linguistic and communicative competence by general practitioners

General practitioners have a crucial role to play in early diagnosis of dementia, for they evaluate the health status of the patient before sending them to a specialist. In accordance with treatment analysis "Demences novērtēšana un diagnostika" (Eng. Evaluation and diagnosis of dementia) [12] the general practitioner makes an initial examination using the MoCA test or elements of MMSE test. The MoCA test, the original version of which is in English, is free, and available in different languages, among them, in Latvian (the analysis of the Latvian translation cf. [13]). The MMSE alias Mini-Mental Status Examination is a timed test and it includes 12 different tasks, among them tasks with regard to language (e.g. No. 10). Related to the grading scale of maximum score (30), the results can indicate stages of dementia. For example, the score 0-9 by evaluating cognitive capacity corresponds to late dementia. However, it is pointed out that a low score cannot always be attributed solely to Alzheimer's dementia nor does it indicate dementia types [14]. These tests, as well as standardized tests of (mental) health with a Patient Health Questionnaire PHQ-2/PHQ-9, examine indications of dementia from a linguistic perspective, for example, by interpreting the patient's answers and determining the difference between depression (pseudodementia) and dementia:

Table No. 1. **Difference between pseudodementia and dementia, according to guidelines** [10, p. 10; 11, p. 8]

Pseudodementia	Dementia
Typical answers of the patient: "I don't know", "it is so difficult".	The patient answers, communicates, but the answers are faulty.

From a linguistic point of view, the interpretation of patient's answers must take into account situational and linguistic aspects of communication before ascertaining any distinctions. For example, "What was the question which had been asked by the general practitioner?" Attention must be paid to the wording of a question, as well as to the appropriate (linguistically reasoned) interpretation of the patient's answers. The term "faulty" is not universal and axiomatic. The neuropsychologist Elisabeth Stechl emphasizes that medical competence of general practitioners cannot easily be brought into line with their linguistic competence and communicative skills [15, cf. 13, p. 245]. It is plausible that diagnostic practice excludes linguistic factors, but currently, there are no data analyses in Latvia which could be used to determine the extent of linguistic elements in medical practice. Furthermore, as noted in specialized literature on the subject, analyses determining either dementia or depressive pseudodementia can be quite difficult, especially in older patients. Difficulties with concentration and memory disorder can be caused by depression:

The psychiatric examination is particularly important. Differentiation from "depressive pseudodementia" can be very difficult. Depressive disorders of elderly people often are associated with concentration and memory problems. Sometimes, it is hard to identify the depressive state of seniors – even under examination, as, the depression is often kept secret. Instead, it is expressed through laments of multiple physical ailments.

Der psychiatrischen Untersuchung kommt besondere Bedeutung zu. Die Abgrenzung zu einer "depressiven Pseudodemenz" kann ausgesprochen schwierig sein. Depressive Störungen sind im Alter oft mit Konzentrations- und Gedächtnisstörungen assoziiert. Der depressive Affekt kann bei älteren Menschen schlecht erkennbar sein, auch bei Nachfrage werden depressive Verstimmungen oft nicht angegeben, sondern durch Klagen über multiple Körperbeschwerden ersetzt. [16, p. 320]

For this reason, psychiatric examination, and additional general interviews with patients are recommended, e.g., using SIDAM (German Abbreviation for: Strukturiertes Interview für die Diagnose einer Demenz vom Alzheimer Typ, der Multiinfarkt- (oder vaskulären) Demenz und Demenzen anderer Ätiologie/English: structured interview for the diagnosis of dementia of the Alzheimer type, multiinfarct dementia and dementias of other aetiology), or other more comprehensive tests [16]. Linguistic evaluation is essential in both the examination and patient interviews

Arriving at an optimal solution for the patients, the general practitioner is involved in communication with them and with their relatives, even during later stages of dementia. Adequate language use und communication skills are essential to this process.

2.2. Linguistic and communication skills of specialized physicians

The next stage in treatment of dementia involves specialized physicians, such as neurologists and psychiatrists. Clinical practice includes connection with both patients and their contact persons. The specialist provides detailed information and formulates agreements regarding the responsibility of the contact person, etc. [10, p. 2]. Practices in both versions of the algorithm differentiate between mild, moderate or even late-stage dementia [10, 11]. Psychiatrists and neurologists need sophisticated skills to communicate with the patient and family members regarding progress of dementia, taking into account the highly differentiated range of the patient's ability to process information at different stages of dementia [cf. 17]. Thus, communication cannot be based solely on a specialists' facility with conventional language practices. The specialist needs additional input in performing language and communication function in order to examine the patient and convey to their contacts, the differences between dementia and pseudodementia as well as to request additional interviews with the patient. (Cf. 2.1. about determination of differences between dementia and pseudodementia, as well as regarding necessity of additional interviews with the patient).

2.3. Linguistic and communicative competence by relatives and (other) daily caregivers

Currently, family members and relatives dominate in caregiving of dementia patients in Latvia. Guidance, including customized communication with patients, is mainly focused on family members (cf. [10, p. 6; 11, p. 3]). Supportive suggestions for treatment of patients with dementia differ significantly from ordinary communication practices, in that (psycho)linguistic procedures must be used to communicate effectively with patients, and these procedures require special attention and training.

Without special instruction or training, individuals in this target group can only rely on their own communication skills, intuitive sense of language, empathy, etc. in talking with a patient with dementia, for example, verbally reminding the patient to use the toilet, and so forth. My personal experience verifies that a simple verbal instruction can be ineffective. For example, my mother, recovering after stroke, did not react to my suggestion to remove her dental prosthesis, which I wanted to clean. She was unpersuadable – she refused to open her mouth and take out her artificial teeth. I became angry and loud. My brother solved the situation by directing me out of the hospitals' bathroom. Obviously, he used more intuitive methods of communicating and convinced our mother to remove her false teeth. Most probably, he was calmer and patient and found a better way to communicate. Basically, discussion of ways and solutions regarding implementation of linguistic findings into practice and transforming them into instructions in layman's

Table No. 2. Guidance for relatives and caregivers from linguistic point of view [11, p. 3]

Guidance	Aspects of linguistic competence
Attempt to respect patient's desires and views as much as possible.	Processing/interpretation of content, as well as language performance through appropriate response to desires and views of the patient, etc.
Encourage the patient, offer positive motivation, do not argue with the patient or express anger.	Language performance related to appropriate speech and expression.
Remind the patient verbally about routines, e.g., about the necessity to use the toilet.	Adequate phrasing: instruction.
Speak slowly, facing the patient and be reassuring, regardless of whether or not the patient has understood the message; if necessary, ask the patient to repeat what he/she heard.	Requirements for complex communication and linguistic competence are: pace and quality of speaking; interpretation of how the message is received, as well as <u>adequate</u> verbal expression of the message.

terms, potentially using principles of "simple language" is recently discussed in Latvia in different contexts [cf. 18]. At the same time, psychoeducation, inclusive communication skills, is universally recommended, for both patients and caregivers, particularly, in cases of mild dementia and before distinctive signs of disturbance in behaviour and mental condition are observed ("Provide psychoeducation to person and carers" [cf. 4, pp. 100–101]).

3. Communication between the medical sector and the public; educational aspects

In every situation in which (Alzheimer's) dementia is involved, aspects of language use and communication are included; likewise, language issues are intrinsic to communication about dementia with the public and/or the medical community. Other than specialized issues of medical content concerning management, treatment and care of patients, special attention should be devoted to the elements of instructional design, as diagnostic texts influence moral and ethical aspects of healthcare. In design of treatment and healthcare management services, the current practice of administrative institutions under the authority of the Minister of Health is to use expressions with a negative connotation when referring to Alzheimer's dementia plans, such as dispensable medical treatments ("nevajadzīgas ārstniecības metodes"), unnecessary costs ("lieki tēriņi"), useless and burdensome patient service ("nelietderīga un pacientu apgrūtinoša pakalpojumu sniegšana"):

so that patients do not use the healthcare service ineffectively and in a futile manner, so that unnecessary medical treatments are avoided, which do not solve the patient's problems but rather create unnecessary costs

("lai pacienti nemērķtiecīgi un lieki neizmantotu veselības aprūpes pakalpojumus, lai netiktu lietotas nevajadzīgas ārstniecības metodes, kas nerisina pacienta problēmas, bet rada liekus tēriņus") [10, p. 4];

promote rational use of social services, so that useless and burdensome patient service can be reduced

("sekmēt sociālo pakalpojumu racionālu izmantošanu, lai mazinātu nelietderīgu un pacientam apgrūtinošu pakalpojumu sniegšanu") [10, p. 4].

Rather than emphasizing deficits in medical treatment and patient care, or focusing on economic factors, the main goal of health care should be positively reinforced, a forward-looking approach should be used, which promotes activities on behalf of patients through positive discussions of management, treatment and care of patients with (Alzheimer's) dementia, for example:

[The healthcare services should be conducted goal-oriented], so that medical treatments are economically efficient and, primarily, as much as possible, all activities may solve the problems of the patient.

(lai veselības aprūpes pakalpojumi būtu mērķtiecīgi, lai izmantotās ārstniecības metodes būtu ekonomiski pamatotas un, pirmām kārtām, pēc iespējas efektīvāk risinātu pacienta problēmas).

Much of the time, materials contain empty phrases, poorly formulated terms of reference or colloquial phrases in Latvian. Some examples, which do not correspond to the proper use language for public communication include:

<u>at best</u>, a nurse of the general practitioner (stylistically awkward reference to patient's contact person: ģimenes ārsta māsa <u>labākā gadījumā</u>) [11, p. 3], specialists are available <u>on site</u>, to be involved as experts (colloquial, without specifying the service institution: speciālisti pieejami <u>uz vietas</u>, piesaistāmi kā konsultanti) [11, p. 6],

Patients of Alzheimer-<u>dementias</u> (groundless plural in Latvian: Alcheimera <u>demenču</u> pacienti) [11, p. 4],

Activities that promote cognitive abilities. Interventions to support patient's cognitive functions, independence and prosperity (illogical semantics: Kognitīvo spēju veicinošas aktivitātes. Intervences, lai veicinātu pacienta kognitīvās funkcijas, neatkarību un <u>labklājību</u>) [11, p. 5]; cf. definition: prosperity 'living conditions, economic situation, characterised by good income and economic well-being' (labklājība 'dzīves apstākļi, materiālais stāvoklis, kam raksturīga pārticība, arī nodrošinātība' [9]).

These random examples (on the par with the incomplete Latvian translation of the MoCA-test [cf. 13]) suggest that interdisciplinary cooperation between medicine and linguistics can improve the language and design of healthcare materials. The freely-accessible PHQ-9 test in the Latvian version is linguistically flawed and partially incomprehensible. An approximate translation of some examples verifies that these questions are nonsensical for Latvian speakers: "How often have you troubled some of these problems during the latest 2 weeks?" ("Cik bieži Jūs pēdējo 2 nedēļu laikā esat nomocījis kāda no šīm problēmām?"); "If you recognized some problems, how these problems changed you into a complicated person and enabled you to do your job, complete homework or come to an understanding with other people" ("Ja Jūs jutāt kādas problēmas, cik sarežģītas šīs problēmas ir padarījušas Jūs, lai Jūs varētu darīt savu darbu, kārtot lietas mājās vai sadzīvot ar citiem cilvēkiem?"), etc. [cf. 19]. One would hope this version is not in medical use.

Recognizing the important role of language and communication has motivated the Latvian Ministry of Health, along with institutions of higher education, to approach these functions with new goals for improvement in mind. Appropriate topics for courses of study have been incorporated into study programmes with the aim of preparing students or those pursuing further professional training to work with persons with dementia symptoms.

To improve the qualifications of medical professionals and medical support personnel, the Ministry of Health is collaborating with different medical institutions, for example, with the Vivendi Health Centre (SIA "Veselības centrs Vivendi"), where specialists offer several informal education programs for training, among them, specialized treatment and care of dementia patients: Diagnosis, Treatment and Care of Dementia ("Demences diagnostika, ārstēšana un aprūpe") [20]. Likewise, the topics such as assessment, risk reduction and other relevant aspects of dementia include linguistic perspectives. However, the current description of the programme does not mention these linguistics elements.

At the Rīga Stradiņš University (RSU) a bachelor's degree study programme Police Work ("Policijas darbs") is offered [21]. Based on an inter-institutional agreement and after the successful recognition of credits, officers of the state police with first-degree specialized diplomas from the State Police College have an opportunity to continue their studies at the RSU in this programmy, starting with the third study year. According to the information provided by the director of this study programme, Assist. Prof. Valdis Voins, the programme includes a course Communications Strategy ("Komunikāciju stratēģija", Course Code: JF_276) with the aim of improving the work of the state police. General tasks of this programme include development of the skills necessary to make decisions in complicated situations and the ability to solve problems [21, cf. 22]. The general course description shows that particular attention is paid to contacts and communication with particular groups in society, as well as to situations which

involve communication barriers [22]. Whether or not these communicative aspects are based on linguistic knowledge and findings is not specified. The list of study literature is dominated by the keywords: "psychology" and "communication".

Conclusions

Consequences of Alzheimer's disease are serious for both patients and their families. Progressive degenerative brain disorders continuously affect a patient's capacity to lead an independent life. As the disease progresses, supervision and care become more necessary, and for 70% of patients, care is in nursing homes. Based on sound evidence, Alzheimer's disease has been classified as one of the most "expensive" diseases to treat, due to the economic burden on families and the health care system. While interests of patients are the main priority, in the case of Alzheimer's patients, maximizing the standard of living and delivering high-quality care during advanced phases to accommodate serious restrictions of mental and physical capacity is a critical aspect of treatment.

Observations presented in this chapter recommend increased attention to dementia, primarily to dementia caused by Alzheimer's disease, in the public sphere, as well as among medical experts in Latvia. Development of public discourse has advanced, due to information delivered in different media (press, radio, TV), as well as events, such as exhibitions, to educate the general public. Support for medical staff on all levels is provided through clinical treatment plans and pathways to guide patients with dementia, as well as by offering training/education programmes which a focus on dementia.

Aspects of linguistics are evident in all these efforts and events, but currently the term "communication" dominates discourse, when "language (usage)" is the appropriate descriptor for the basis of <u>communication</u>: cf. the lexicographic definition in different languages – *komunikācija* "sazināšanās, informācijas pārraide, piem., valodiskā komunikācija" [23], *Kommunikation* "Verständigung untereinander; zwischenmenschlicher Verkehr besonders mithilfe von Sprache, Zeichen" [24], *communication* "a process by which information is exchanged between individuals through a common system of symbols, signs, or behaviour" [25].

Analyses of the situation indicate that language usage is not sufficiently recognized as a relevant factor in addressing dementia. The academic study of acquired linguistic skills, cognitive impairment and communicative difficulties of persons with dementia is required for sufficient language training. For example, the idea of encouraging an individual to learn a foreign language as a dementia-preventive action could be valuable. To undertake this effort, how to make the learning process effective? Furthermore, caregivers are advised to pay attention to patient's desires and views etc., but this instruction does not specify how to verbally respond to the patient's comments; while training programmes

include aspects of communication, they still lack instruction in basic principles of linguistics. In Latvia, the value of Humanities' contributions from both theoretical and practical points of view needs to be recognized and incorporated in treatment of Alzheimer's dementia.

Inclusion of linguistic theory, research results and linguistic experience in designing procedures and care of patients with dementia would represent a qualitative leap in treatment of this condition. While exemplary precedent exists in international practice, similar interdisciplinary cooperation between the fields of medicine and linguistics must begin in Latvia. Initially, this cooperation would involve a focus on the patient's needs, the establishment of common research fields, as well as development of coordinated research methodology to develop efficient, long-term fundamental research projects. This chapter demonstrates the necessity of establishing joint fields of interest and common investigations for appropriate diagnosis of dementia, including communication between the general practitioner and patient during different stages of dementia, treatment and care, training/education of medical staff and of caregivers. At the same time, there are several areas of attention which are indirectly connected with medicine, yet remain a focal point of linguists, as patients with Alzheimer face relevant social and legal issues that involve appropriate language comprehension and communication.

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