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ORIGINAL ARTICLE

QUALITY OF LIFE OF PATIENTS WITH CHRONIC MYELOID LEUKEMIA IN IMATINIB USE

QUALIDADE DE VIDA DOS PACIENTES COM LEUCEMIA MIELOIDE CRÔNICA EM USO DE IMATINIBE

CALIDAD DE VIDA DE LOS PACIENTES CON LEUCEMIA MIELOIDE CRÓNICA EN USO DE IMATINIB

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ABSTRACT

Objective: to evaluate the quality of life of patients with chronic myeloid leukemia using Imatinib mesylate. ***Method:*** a cross-sectional study, with quantitative approach, performed at a University Hospital. The sample consisted of ten patients, with data collection from the SF-36 quality of life questionnaire. Descriptive and inferential statistics were used to verify association between the variables. ***Results:*** the decline in quality of life occurred due to limitations due to physical, emotional and pain aspects that presented, mainly, correlation with medication time, disease time and general health status. No direct correlation has been identified with the use of Imatinib. ***Conclusion:*** quality of life is affected by numerous factors linked to the disease. Thus, the importance of the interventions and actions of the multi-professional team to this public is emphasized, emphasizing integral attention and health promotion. ***Descriptors:*** Oncology Nursing; Leukemia Myelogenous Chronic BCR-ABL Positive; Quality of Life.

RESUMO

Objetivo: avaliar a qualidade de vida dos pacientes com leucemia mieloide crônica em uso de Mesilato de Imatinibe. ***Método:*** estudo transversal, com abordagem quantitativa, realizado em um Hospital Universitário. A amostra foi constituída por dez pacientes, com coleta de dados a partir do questionário de qualidade de vida SF-36. Foi empregada a estatística descritiva e inferencial dos dados para verificar a associação entre as variáveis. ***Resultados:*** o declínio da qualidade de vida ocorreu devido às limitações por aspectos físicos, emocionais e dor que apresentaram, principalmente, correlação com o tempo de medicação, tempo de doença e estado geral de saúde. Não foi identificada correlação direta com o uso do Imatinibe. ***Conclusão:*** a qualidade de vida é afetada por inúmeros fatores ligados à doença. Assim, ressalta-se a importância das intervenções e ações da equipe multiprofissional para com esse público, enfatizando a atenção integral e promoção da saúde. ***Descritores*:** Enfermagem Oncológica; Leucemia Mielogênica Crônica BCR-ABL Positiva; Qualidade de Vida.

RESUMEN

Objetivo: evaluar la calidad de vida de los pacientes con leucemia mieloide crónica en el uso de mesilato de Imatinib. ***Método:*** estudio transversal, con un enfoque cuantitativo, llevado a cabo en un Hospital Universitario. La muestra consistió en diez pacientes con colección de datos a partir de encuesta de calidad de vida SF-36. Fue empleado los datos de estadística descriptiva e inferencial para comprobar la asociación entre variables. ***Resultados:*** la disminución de la calidad de vida ocurrió debido a las limitaciones por aspectos físicos, emocionales y dolor que presentaron, sobre todo, correlación con el tiempo de medicación, la enfermedad y la salud en general. No hay correlación directa con el uso de Imatinib. ***Conclusión:*** la calidad de vida es afectada por numerosos factores relacionados con la enfermedad. Por lo tanto, se resalta la importancia de las intervenciones y acciones del equipo multidisciplinario con este público, destacando la promoción de salud y atención integral. ***Descriptores*:** Enfermería Oncológica; Leucemia Mielógena Crónica BCR-ABL Positiva; Calidad de Vida.

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INTRODUCTION

Chronic myeloid leukemia (CML) is a clonal myeloid-proliferative disease of bone marrow cells, characterized by specific cytogenetic abnormality, the Philadelphia chromosome (Ph +). This factor is derived from the chromosomal translocation between chromosomes nine and 22 which, through the fusion of BCR and ABL genes, presents the translation of a protein with altered tyrosine kinase activity.[1]

This specific marker is present in more than 90% of cases of CML, which accounts for 20% of all leukemia. Clinically, this disease has three phases: chronic or stable, an accelerated (metamorphosis or transformation) and, finally, an acute phase (blast crisis).[1-2]

Imatinib mesylate is indicated for the treatment of patients with chronic myeloid leukemia in blast crisis, accelerated phase, or in chronic phase of the disease. The introduction of imatinib mesylate has changed the landscape of CML treatment worldwide and is now considered the first-line standard treatment in patients with newly diagnosed chronic myeloid leukemia whose four-year update, in the accelerated phase, demonstrates a good response Hematological and cytogenetic analysis in 65% of cases [(3-4)]

Treatment with imatinib mesylate should be started as soon as possible after the diagnosis of CML, which is then the first generation treatment. Of second generation, can be mentioned the desatinib and nilotinib can be mentioned. Adherence to treatment with imatinib mesylate is directly related to the likelihood of molecular and cytogenetic responses and also to disease-free survival. The improvement of the diagnostic and treatment methods increased the number of survivors, which made the scientific community's attention to the consequences of the new treatments on the quality of life of patients/survivors.[5-6]

Therefore, these patients started living longer with various cancer-related problems and morbidities and/or related treatments. After the diagnosis of cancer, the patient experiences the fear of pain and death. A new lifestyle is imposed upon him, with changes in his social pattern and changes in his self-esteem. The patient's psychological balance is threatened not only by the fear of death, but also by the fear of living with changes that will be necessary in the course of the illness and the treatments related to it. The data collected are important indicators of the efficacy and impact of certain treatments.[6-8]

Traditionally, the therapeutic efficacy is evaluated, in cancer research, by biomedical parameters such as tumor reduction, disease free interval and toxicity. However, the results of cancer treatment also need to be measured in terms of what it brings with physical and psychological limitations to the patient. Hence, the need to establish the impact of the disease, and its treatment, on the patient's quality of life.[9]

After the discovery of this need, the survival and quality of life of these patients became the two main goals of cancer treatment. Therefore, the objective of this study was to evaluate the quality of life of patients with chronic myeloid leukemia, using imatinib mesylate, through the SF-36 quality of life questionnaire.

METHOD

An exploratory cross-sectional study with a quantitative approach performed at the chemotherapy clinic of the Antônio Pedro University Hospital (APUH) during the periodic medical consultations of patients with CML enrolled in the hospital and treated with imatinib mesylate.

The participants of this research were 30 patients undergoing treatment at the Chemotherapy Outpatient Clinic of the University Hospital Antônio Pedro (APUH), but, during the data collection period, which occurred from March to May 2012, only ten patients composed the study sample, one with the diagnosis of chronic myeloid leukemia in the chronic phase of the disease; treatment with the drug target-molecular action imatinib mesylate; age greater than 18 years and absence of cognitive deficit, as well as exclusion criteria: patients diagnosed with accelerated-phase chronic myeloid leukemia or blast crisis; on treatment with hydroxyurea, or interferon (INF) and other tyrosine kinase inhibitor drugs.

The research participants were invited to fill out the data collection instrument, the SF-36 quality of life questionnaire, in a reserved room during the Nursing consultation. The procedures followed by this study are in accordance with the ethical standards of the Research Committee on Human Beings of the Federal Fluminense University (FFU), with resolution 466/2012 of the National Health Council. The research project was appreciated and approved by the Research Ethics Committee of the College of Medicine of FFU (CEP-CMM / HUAP 359/2011).

Data collection was performed using the SF-36 quality of life questionnaire. It is a generic instrument of evaluation of the

quality of life of easy administration and comprehension, composed of 36 items encompassed in eight scales or components: functional capacity, physical aspects, pain, general health, vitality, social aspects, emotional aspects and mental health.[7]

The quantitative analysis of each score was performed through the scores obtained in each component of the SF-36 questionnaire, where zero corresponded to the worst health condition and 100 to the best health status, with an average of 50 and standard deviation 10. The Most prevalent scores on each question.

From the results obtained in the analysis of each score, the SAS software version 9.1.3 was performed, in which the descriptive analysis of the variables (mean, standard deviation, minimum and maximum) was performed for quantitative variables and absolute and relative frequency for qualitative variables. In order to verify associations between the variables of the study, the *Shapiro-Wilk* normality test, Pearson's correlation analysis, the ANOVA test for the variables with Normal distribution and *Kruskal Wallis* for the variables that did not present Normal distribution. All statistical tests were performed considering the level of significance of 5%.

RESULTS

In this work, a sample of ten individuals was used, with descriptive statistics, data correlation and, subsequently, data normality test to perform some statistical tests, correlation tests and equality of means to verify if there is difference in results of the eight domains in relation to some variables. All tests performed are based on a significance level of 5%.

Table 1. Distribution of descriptive analysis of the SF-36 quality of life questionnaire domains and of the variables age, disease time and medication time. Niterói (RJ), Brazil, 2014.

Variable	Average	Standard deviation	Maximum	Minimum
Age	52.2	12.47	73	31
Time of disease *	5.2	2.61	9	2
Time of medication **	5.11	2.36	8	2
Functional capacity	67.5	24.4	100	30
Limitations due to physical aspects	22.5	34.25	100	0
Pain	46	0.078	100	0
General Health State	62.5	18.02	82	27
Vitality	55.75	31.04	100	15
Social aspects	71.25	29.49	100	25
Limitation due to emotional aspects	36.7	48.32	100	0
Mental health	68.8	26.31	100	20

The mean age of participants, according to Table 1, was 52 years, with a standard deviation of 12.47, a minimum of 31 years and a maximum of 73 years. The average disease time, was five years, with deviation Standard deviation of 2.61, a minimum of two and a maximum of nine years. The time the patients were taking the medication under study was an average, of five years, with deviation of 2.36, minimum time of two years and maximum time of eight years. The functional capacity of the participants had an average of 67.5, with a deviation of 24.4, a minimum of 30 and a maximum of 100.

Regarding the limitation by physical aspects, an average of 22.5, a deviation of 34.25, a minimum of zero and a maximum of 100 was observed. As for pain, the mean is 46, the standard deviation was 0.0078, minimum zero and maximum 100. In relation to the general health state, a mean score of 62.5, a standard deviation of 18.02, a minimum of 27, and a maximum of 82 was observed. A vitality score of 55.75 was found, on the Deviation of 31.04, minimum of 15 and maximum of 100.

Regarding social aspects, we found an average of 71.25, a deviation of 29.49, a minimum of 25 and a maximum of 100. Observing the limitations by emotional aspects, we found an average of 36.7, with a deviation of 48.32 , Minimum of zero and maximum of 100. Finally, considering the mental health of patients, was found an average is 68.8, with deviation of 26.31, minimum of 20 and maximum of 100.

It should be noted that the variables disease time and medication time were created from the dates that were placed in the participants' report, both when the disease was discovered and the date of initiation of treatment with imatinib mesylate. Later, it was verified if there was any statistical alteration in the behavior of the domains of the patients.

Table 2. Distribution of the clientele according to socio-demographic characteristics. Niterói (RJ), Brazil, 2014.

Variable		n	%
Sex	Female	4	40%
	Male	6	60%
Ethnicity	White	4	40%
	Black	5	50%
	Yellow	1	10%
Education*	Incomplete elementary school	1	13%
	Complete elementary school	2	25%
	Incomplete highschool	2	25%
	Complete highschool	2	25%
	Complete higher education	1	13%
Marital Status*	Married	7	88%
	Single	1	13%

* Two patients with missing information.

The data in Table 2 showed 40% of female participants and 60% of male participants. Of these patients, 40% are white, 50%, black and 10% brown ethnicity. Among the participants, 13% had incomplete elementary school; 25%, completed elementary school; 25%, incomplete high school; 25%, completed high school and 13%, higher education. As for marital status, 88% were married and 13%, were single. Two participants did not respond to the variables: schooling and marital status.

Table 3. Analysis of the statistical association between the domains of the SF-36 quality of life questionnaire. Niterói (RJ), Brazil, 2014.

VR	TD	TR	CF	LAF	Dor	EGS	VT	AS	LAE	SM	DTD/TR
DT	100.000	0.98644	0.52197	0.19216	-0.04259	0.45723	0.15184	-0.02520	0.49266	0.01678	0.03517
		<.0001*	0.1217	0.5948	0.9070	0.1840	0.6754	0.9449	0.1480	0.9633	0.9232
TR	0.98644	100.000	0.76358	0.74462	-0.20996	0.64677	0.41963	0.00704	0.81672	0.19685	0.49252
	<.0001*		0.0166*	0.0214*	0.5877	0.0598	0.2609	0.9857	0.0072*	0.6117	0.1780
FC	0.52197	0.76358	100.000	0.67266	-0.51354	0.77360	0.57636	0.13987	0.68310	0.35284	0.63608
	0.1217	0.0166*		0.0331*	0.1290	0.0087*	0.0812	0.6999	0.0295*	0.3173	0.0480*
PAL	0.19216	0.74462	0.67266	100.000	-0.26681	0.63220	0.67445	0.23026	0.78806	0.34753	0.80573
	0.5948	0.0214*	0.0331*		0.4562	0.0499*	0.0324*	0.5222	0.0068*	0.3251	0.0049*
Pain	-0.04259	-0.20996	-0.51354	-0.26681	100.000	0.01256	0.05327	0.15054	-0.10123	-0.09420	-0.54425
	0.9070	0.5877	0.1290	0.4562		0.9725	0.8838	0.6781	0.7808	0.7957	0.1039
GHS	0.45723	0.64677	0.77360	0.63220	0.01256	100.000	0.64966	0.06925	0.70000	0.40204	0.49144
	0.1840	0.0598	0.0087*	0.0499*	0.9725		0.0420*	0.8492	0.0242*	0.2494	0.1491
VT	0.15184	0.41963	0.57636	0.67445	0.05327	0.64966	100.000	0.17026	0.81306	0.54447	0.40933
	0.6754	0.2609	0.0812	0.0324*	0.8838	0.0420*		0.6382	0.0042*	0.1037	0.2401
SA	-0.02520	0.00704	0.13987	0.23026	0.15054	0.06925	0.17026	100.000	0.30121	0.52680	-0.00975
	0.9449	0.9857	0.6999	0.5222	0.6781	0.8492	0.6382		0.3977	0.1177	0.9787
LEA	0.49266	0.81672	0.68310	0.78806	-0.10123	0.70000	0.81306	0.30121	100.000	0.56910	0.42789
	0.1480	0.0072*	0.0295*	0.0068*	0.7808	0.0242*	0.0042*	0.3977		0.0860	0.2174
MH	0.01678	0.19685	0.35284	0.34753	-0.09420	0.40204	0.54447	0.52680	0.56910	100.000	0.32863
	0.9633	0.6117	0.3173	0.3251	0.7957	0.2494	0.1037	0.1177	0.0860		0.3539
DRT/RT	0.03517	0.49252	0.63608	0.80573	-0.54425	0.49144	0.40933	-0.00975	0.42789	0.32863	100.000
	0.9232	0.1780	0.0480*	0.0049*	0.103	0.149	0.240	0.9787	0.2174	0.353	

9	1	1	9

Caption: * Tests that presented significant statistical association. VR = Variables, DT = Disease time, TR = Time of remedy, FC = Functional capacity, PAL = Physical aspects limitation, GHS = General health status, VT = Vitality, SA = Social aspects, LEA = Limitation by emotional aspects , MH= Mental health, DRT / DT = Difference between remedy time and disease time.

In the above table, we performed the correlation test to verify the existence of correlation between the domains and the variables of disease time, medication time and the difference of these times, since the difference in the time in which the person discovered the disease and the time that she started treatment with the drug may interfere in some of the domains.

With this, we observed a correlation between disease time and medication time. The duration of medication, in addition to the mentioned correlation, showed a correlation with functional capacity, limitation for physical aspects and limitation for emotional aspects. Functional capacity also presented correlation, with physical aspect limitation, general health status, limitation by emotional aspects and with differences in disease time and medication time. The limitation by physical aspects also had a correlation with general health status, vitality, limitation by emotional aspects.

On the time difference of disease and medication time, the pain domain showed no correlation with any variable. The general state of health also presented correlation, with vitality and limitation by emotional aspects. The vitality aspect also correlated with limitation by emotional aspects. The social aspects showed no correlation, with any variables, as well as limitations due to emotional aspects did not present correlation, beyond those already mentioned previously. The mental health aspect also showed no correlation with any variable. Finally, the difference in disease time and medication time did not show any correlation other than those previously mentioned.

In the first line of each variable, can be found the value of the correlation coefficient. In the second row, is the value p. It should be emphasized that the results were based on p value.

Table 4. Distribution of the normality test for the domains of the SF-36 quality of life questionnaire. Niterói (RJ), Brazil, 2014.

Variable	Normality test
Functional capacity	0.1468
Limitation due to physical aspects	0.0019
Pain	0.6525
General health state	0.1415
Vitality	0.2906
Social aspects	0.0587
Limitation due to emotional aspects	0.0006
Mental health	0.5298

Considering the results of the normality test for the eight domains, it was verified only that the limitation by physical aspects and limitation by emotional aspects presented non-normal distribution. The other domains had a normal distribution.

Table 5. Distribution of the test of equality of the means of the domains of the questionnaire of quality of life SF-36 with reference to the variable ethnicity. Niterói (RJ), Brazil, 2014.

Variable	Equality test for ethnicity
Functional capacity*	0,2664
Limitation due to physical aspects*	0,7299
Pain*	0,0248
General health state*	0,9955
Vitality*	0,7712
Social aspects*	0,8329
Limitation due to emotional aspects*	0,5033
Mental health*	0,5605

Key: * ANOVA test for variables with normal distribution. ** Kruskal Wallis test for variables whose distribution is not normal.

Thus, it is worth mentioning that, in table 5, it was observed that the pain variable was the only domain that presented a significant difference in relation to the ethnicity of the sample.

Table 6. Distribution of the test of equality of the means of the domains of the questionnaire of quality of life SF-36 with reference to the educational variable. Niterói (RJ), Brazil, 2014.

Variable	Equality test for schooling averages
Functional capacity*	0,1103
Limitation due to physical aspects*	0,8211
Pain*	0,0131
General health state*	0,7551
Vitality*	0,9246
Social aspects*	0,4126
Limitation due to emotional aspects*	0,3425
Mental health*	0,2746

Key: * ANOVA test for variables with normal distribution. ** Kruskal Wallis test for variables whose distribution is not normal.

In Table 6, the pain variable was again the only domain that presented a significant difference in relation to the schooling of the participants.

DISCUSSION

It was observed, in this study, that the domains that obtained an average of less than 50 were: limitations due to physical aspects (mean 22.5), limitation by emotional aspects (mean 26.7) and pain (mean 46). As for the other domains, social aspects (mean 71.25), functional capacity (mean 67.5), and mental health (mean 62.6), general health status (mean 62.5) and vitality (mean 53.95), obtained a mean above 50. Therefore, the classification for these domains was not impacting on patients' quality of life.

Among the eight domains evaluated by the study questionnaire, those that did not present normal distribution were limited by physical aspects and limitations due to emotional aspects.

The physical aspects limitation was the domain most affected, evaluated in the questionnaire by question number four. In this evaluation, patients were asked, if they had any problems with their work or with some regular activity, during the last four weeks as a consequence of their physical health.

In addition, such limitation presented a statistically significant correlation with the time of medication use. The patients who present a greater use of drug therapy have a significant quality of life deficit.

Imatinib mesylate is shown to be generally well tolerated. Most patients taking this medication have side effects, but, are classified as mild to moderate in severity. These adverse effects are characterized as nausea, diarrhea, muscle cramps, skeletal muscle pain, hemorrhage, rashes and fluid retention. A contributing factor for the occurrence of adverse effects is the prescribed dose and tolerance of the organism to the drug. Higher doses have been shown to be associated with more severe adverse events, compared to lower dosages of imatinib.[10-11]

Therefore, the side effects caused by the use of Imatinib may be conditioning the degradation of the physical, psychological and emotional aspects that favor the decline of the quality of life in cancer patients.

In this context, a recent observational study, that sought to evaluate the quality of life in patients with CML, identified that the change in medication prescription favored a significant improvement in quality of life, but Imatinib was not associated with this change.[12] In addition, there is data suggesting that, in patients with complete disease remission, treatment can be safely discontinued. Although the number of these patients is small, discontinuation of treatment is particularly important for quality of life.[13]

Regarding quality of life, there is evidence to show that patients who used Imatinib in treatment for CML achieved significantly better mean family, social and emotional well-being and utility scores than patients treated with interferon.

As reported orally by the majority of patients who answered the questionnaire, 80% of the patients, fatigue was the most present adverse effect observed by the researcher at the time of application of the questionnaire. This fatigue was reported as present and continuous, even with absence of efforts, being, thus, a contributing factor to the limitation of work and regular daily activities.

Cancer-related fatigue is one of the most common symptoms among oncology patients and is considered a serious and complex clinical problem that should be discussed in a multidisciplinary way. It has not been valued, as an expected adverse effect to treatment and has been reported by patients as a subjective experience of generalized fatigue.[15-6] In relation to the achievements of patients' daily activities, fatigue is a state caused By physical and mental aspects, which interferes with the performance of daily activities.[15-6]

The limitation for emotional aspects was the second lowest mean (26.7). This domain was evaluated in question five. Patients were asked, whether during the last four weeks, they had decreased the amount of time spent, less or not performed with such care, the regular daily activities or their work as a consequence of some emotional problem, such as feeling depressed or anxious. In accordance with the above, it is emphasized that this limitation showed a correlation with functional capacity deficit.

Considering the above, we can reflect that cancer, even in the present day, can be considered a disease that has stigmas, related to negative feelings, even when there is no expectation of impending death.[17]

Most cancer patients have difficulties accepting the disease. This can be attributed to several factors such as the loss of ideals, life goals, and social roles and, in addition, to the fact of causing suffering to the family, highlighting the fear of prolonged suffering. In this way, fear persists and the impact of the diagnosis can cause changes in attitudes towards the disease.[18]

These questions highlight the influence of the diagnosis of cancer in the life of an individual, where questions, anxieties, fears about his health or even about death are reached. The patient's emotional state is fragile and, on many occasions, these patients need a follow-up from a Psychology professional, focusing on a multi-professional treatment for the patient with a diagnosis of cancer, even if the patient has a chronic evolution and an outpatient treatment.

One study showed that most patients believe in the effectiveness of using alternative medicine in cancer treatment. The most used is individual prayer, showing that religiosity and complementary medicine correlate significantly with a better quality of life. In addition, cancer patients, when confronted with living with a serious illness, seek methods based on religiosity for coping.[19]

The pain domain was the third item with the lowest overall mean (46) and also the only domain, among the eight, that showed a significant difference in relation to the schooling of the participants and the race.

This domain was evaluated by the sum of the scores for questions seven and eight. The issue of number seven ranks how much "body pain" the patient had during the last four weeks in none, very mild, mild, moderate, severe, and very severe, and question number eight ranks how much this "pain" interfered in the Your normal work (including in-house work) during the last four weeks in: not at all, a little, moderately, quite, and extremely.

The issue of number eight has classified how much this "pain" has interfered with your normal work (including in-house work) for the last four weeks in: not at all, a little, moderately, quite, and extremely.

According to the patients' responses, the majority rated this "pain" as moderate (40%) and none (30%) and did not interfere with their work in any way in 40% and interfered a little in 30%.

This pain-related domain may be considered a limitation for the study because the SF-36 quality of life questionnaire evaluates patients about "body pain", not specifying the type of pain, such as: pain in the muscles, pain in the bones, pain in the joints or classifying this pain as muscular fatigue, being expressed as non-specific fatigue by the patient, in which it was reported by the patients during the application of the study questionnaire. These manifestations are classified as very common adverse reactions to patients taking the drug in question.

Thus, questions seven and eight, referring to the pain domain are subjective to specifically evaluate the pain questioned by patients, not being classified by the investigator of this study.

Pain is one of the most feared aspects of cancer and implies a great impact on the quality of life of cancer patients.[20] Because of this, the importance of future studies that evaluate and specify this pain reported by the patients who answered the study questionnaire is emphasized. Thus, research showed that pain significantly interferes with quality of life, however, the scale identifies only the score of this influence, and it is not possible to assertively verify the statistical index as to how pain reduced this variable.

The psyche is linked to the body and this fact has important consequences, since any changes in the body will have repercussions on the order of the psyche. (18) Thus, professionals working with cancer patients should be attentive to subjective and peculiar issues of this public, since, many times, the pain reported is not physical but, a consequence of psychic changes. Stressed the importance of studies related to patients with cancer and pain.

The literature addresses some non-pharmacological interventions that can intervene in the pain reported by the patient. They are: music therapy, hypnosis, relaxation techniques, aromatherapy massage. For the

professional to intervene, it is necessary technical-scientific knowledge, both for the education programs aimed at the cancer patient, and also, of extreme importance, to the health professionals.[21]

CONCLUSION

It was verified that the domains that obtained the smallest means, among those evaluated by the questionnaire used in the study, were the limitations due to physical aspects, limitations due to emotional aspects and pain, evidencing their impact on the quality of life of patients with chronic myeloid leukemia. This result implies in the interventions and actions of the multi-professional team that attends this public, emphasizing the integral attention of this patient.

Thus, factors influencing physical and emotional capacity should be constantly evaluated so that they do not indirectly affect treatment with Imatinib Mesylate, since factors that affect quality of life are influential in patient adherence to medications in continuous use, such as that of the study. Therefore, it is essential that the professionals of specialized cancer centers be sensitive and are prepared to identify the peculiarities of the patients in use of target-molecular drugs and, mainly, to the process of illness of each individual. Thus, from the perspective of cancer patients using Imatinib Mesylate, care allows care to be focused on completeness, valuing both objective, and subjective elements.

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