2025 年度名古屋大学大学院医学系研究科博士前期課程 総合保健学専攻

[一般選抜·社会人特別選抜]

専門科目 出題の意図

保健学領域における専門的な学力を問う。

英 語 出題の意図

科学英語の基礎的読解力および保健学領域における専門的な学力を問う。

面 接質問内容例

進学の動機、希望する研究内容、それに関する知識と理解度、国際性が求められる研究 大学大学院生として入学後に取組むべきこと、将来への展望(思い描くキャリアパス、博 士後期課程への進学希望)など

2025 年度名古屋大学大学院医学系研究科博士後期課程

総合保健学専攻

[一般選抜·社会人特別選抜]

英 語 出題の意図

科学英語の基礎的読解力および保健学領域における専門的な学力を問う。

Examinee Number _{受験番号}

Nagoya University Graduate School of Medicine 2025年度 名古屋大学大学院医学系研究科

Entrance Examination for the Doctoral Program 博士後期課程入学試験

English

Course in Physical and Occupational Therapy Field of Physical Therapy, Occupational Therapy リハビリテーション療法学コース 理学療法学分野・作業療法学分野

> August 29(Thu) 11:00~12:00 ^{8月29日 (木)}

Important Points

注意事項

- **1.** Do not open the examination booklet until directed to do so. 試験開始の合図まで、この冊子を開いてはいけません。
- 2. This booklet has <u>9</u> pages, including the cover page. この冊子のページ数は、表紙を含めて 9ページあります。
- 3. If you find a problem in the booklet, such as omission of page or unclear print, please raise your hand and wait for a director. 落丁、乱丁、印刷不鮮明の箇所等があったら、直ちに申し出てください。
- 5. Your answer must be written in the space indicated on each answer sheet, in the designated language. Answers written outside the designated space will not be considered as valid answers. 解答は、問題の指示に従って日本語または英語で所定の欄に記入してください。所定の欄以外に記入した解 答は無効です。
- You must stay at the examination venue until the time allotted for the examination expires. 試験終了時刻まで退出してはいけません。
- 7. Do not take this booklet out with you when you leave the examination venue.

この冊子は持ち帰ってはいけません。

1. 以下の文章を読み設問 1-6 に日本語または英語で答えなさい。 Read the following text and answer the questions 1-6 in Japanese or English.

この部分につきましては著作権の都合により公開いたしません。

(Modified from Age Ageing. 2024; 53(3): afae052)

注: ICD10-CM; International Classification of Diseases, Tenth Revision, Clinical Modification, ICD-10; International Classification of Diseases, Tenth Revision, pharmacological; 薬理的な, harmonise; 調和する, impede, 妨げる

問1:下線部 ① Sarcopenia とは何か? Q1: What is ① Sarcopenia?

問2:サルコペニアによってどのようなリスクが増大するのか? Q2: What risks are increased by sarcopenia?

問3:現在のサルコペニアの定義に関する問題点は何ですか? Q3: What are the problems regarding the current sarcopenia definition?

問4:下線部②が示す問題とは何か? Q4: What are the issues indicated by the underlined part ②?

問5:サルコペニアの世界的な定義があるとどのような発展が得られるか? Q5: What developments will be acquired, if there is a global definition of sarcopenia?

問6:GLIS が結成された目的は何か? Q6:What was the purpose of forming the GLIS?

Entrance examination for the Doctoral Program of Nagoya University Graduate School of Medicine

大学院医学系研究科博士後期課程試験問題

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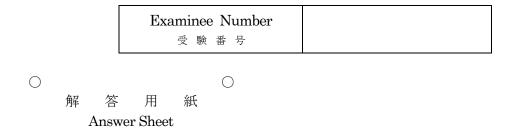
2. Read the following sentences and answer the questions.

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(From Melf-Marzi et al., Dtsch Arztebl Int, 2022)

Entrance examination for the Doctoral Program of Nagoya University Graduate School of Medicine

大学院医学系研究科博士後期課程試験問題



Q1: Check ONE appropriate phrase in parentheses (\checkmark) for each question.

- 1) What is the main aim of combining physiotherapy and occupational therapy with neurocognitive elements in treatment?
- () To completely eliminate pain
- () To develop new medications
- () To normalize sensorimotor integration
- () To improve patient satisfaction

2) What is one potential downside of mirror therapy for post-stroke (X) mentioned in the text?

- () It is very expensive
- () It can worsen symptoms or affect the contralateral side
- () It requires specialized equipment
- () It does not involve computer applications

3) Which technique is directed towards cortical reorganization?

- () Self-efficacy training
- () Virtual fine motor training and graded motor imagery
- () Occupational therapy
- () Visuo-tactile stimulation

4) Why is pain exposure without psychological support controversial?

- () It is too costly
- () It leads to frequent discontinuations of treatment
- () It lacks scientific evidence
- () It does not improve sensorimotor integration

Q2: Choose the MOST appropriate word for (A) to (D) and check the box in parentheses (\checkmark).

1) The latest revision of the International Statistical Classification of Diseases and Related Health Problems (ICD-11) now categorizes (X) as a primary pain condition (A) multifactorial origin.

- () of
- () from
- () with
- () by

2) Mirror therapy appears to be particularly effective (B) post-stroke (X), but it is not sufficient on its own for the majority of cases.

- () in
- () at
- () for
- () with

3) There is adequate proof (${\rm (C)}$) graded exposure can improve function, pain, and fear.

- () what
- () that
- () where
- ()_{as}

4) In such an approach, occupational therapy, physiotherapy and psychology work closely (D).

- () together
- () apart
- () along
- () away

Q3: Explain in English in 20 words or less what ①kinesiophobia is.

Q4: The name of the disease is placed in (X). Explain in 30-40 words in English what is difficult about the rehabilitation of this disease. <u>You DO NOT need to answer the name of the disease in (X). You can use (X) as it is in your answer text.</u>

- Q5: Select the title that BEST fits the sentences and check the box in parentheses (\checkmark).
- () Comprehensive approach to (X) rehabilitation
- () A rare consequence of surgical procedures
- () Insights into minor complications
- () Benefits of physical and occupational therapies
- () ICD-11 revision: (X) as a skeletal disorder

問1:下線部 ① Sarcopenia とは何か? Q1: What is ① Sarcopenia?

(解答例)

サルコペニアとは、加齢に伴う筋肉量の減少、筋力や機能の低下を指す。

Sarcopenia is the age-related loss of muscle mass and decline in strength and function.

問2:サルコペニアによってどのようなリスクが増大するのか? Q2: What risks are increased by sarcopenia?

(解答例)

サルコペニアは、障害、転倒、死亡を含む明確な臨床転帰のリスクを高める。 Sarcopenia increases the risk of distinct clinical outcomes including disability, falls and mortality.

問3:現在のサルコペニアの定義に関する問題点は何ですか? Q3: What are the problems regarding the current sarcopenia definition?

(解答例)

サルコペニアには、臨床の場で日常的に使用できるような、世界的で広く受け入れられた定義がない。 Sarcopenia lacks a global and widely accepted definition that can be routinely used in clinical settings.

問4:下線部②が示す問題とは何か?

Q4: What are the issues indicated by the underlined part 2?

(解答例)

第一に、サルコペニアの有病率、発生率、原因、結果に関する研究は、定義が異なるために有病率の推定値が大き く異なったり、サルコペニアの重要な結果が異なることがあるため、調和させることが困難な場合が多い。第二に、 統一された定義がないため、患者を診察する者が、患者を評価する際にどの指標やカットオフポイントを用いるべ きかが不明確となり、臨床的な影響を及ぼすことがある。第三に、統一された定義がないため、サルコペニアのク リニカルケアパスの開発が妨げられている。

First, research into the prevalence, incidence, and causes and consequences of sarcopenia is often difficult to harmonise, as disparate definitions can lead to widely different estimates of prevalence or can identify different important consequences of sarcopenia. Second, the lack of a single definition has clinical implications because those seeing patients may be uncertain as to which measures or cut-off points to use when evaluating patients. Third, the lack of a unified definition has impeded the development of clinical care pathways for sarcopenia.

問5:サルコペニアの世界的な定義があるとどのような発展が得られるか? Q5: What developments will be acquired, if there is a global definition of sarcopenia?

(解答例)

サルコペニアの世界的な定義は、この病態の臨床的認知を世界的に高めるであろう。さらに、サルコペニアの有病 率推定の妥当性を高め、患者を評価する際に用いる指標やカットオフポイントを統一し、サルコペニアのクリニカ ルケアパスの開発を促す。

A global definition of sarcopenia would increase clinical recognition of this condition worldwide. In addition, it increases the validity of prevalence estimations for sarcopenia, unifies measures or cut-off points to use when evaluating patients, and prompts the development of clinical care pathways for sarcopenia.

問6:GLIS が結成された目的は何か? Q6:What was the purpose of forming the GLIS?

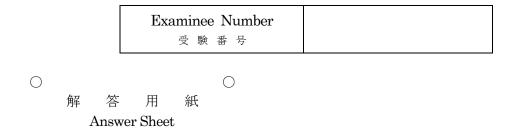
(解答例)

GLIS は、サルコペニア評価のゴールドスタンダードとして使用される、いくつかの競合する定義を1つの統一された共通の分類に調和させる試みで結成された。 The Global Leadership Initiative in Sarcopenia (GLIS) was formed in an attempt to harmonise several competing definitions into one

unifying common classification that would be used as the gold standard in sarcopenia assessment.

Entrance examination for the Doctoral Program of Nagoya University Graduate School of Medicine

大学院医学系研究科博士後期課程試験問題



- Q1: Check ONE appropriate phrase in parentheses (\checkmark) for each question.
- 1) What is the main aim of combining physiotherapy and occupational therapy with neurocognitive elements in treatment?
- () To completely eliminate pain
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Q2: Choose the MOST appropriate word for (A) to (D) and check the box in parentheses (\checkmark).

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4) In such an approach, occupational therapy, physiotherapy and psychology work closely (D).

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() apart

- () along
- () away

Q3: Explain in English in 20 words or less what ①kinesiophobia is.

(解答例)

Kinesiophobia is the fear of movement due to the belief that it will cause pain or further injury.

Kinesiophobia is the fear of movement that makes one think it will hurt oneself.

Kinesiophobia is a fear of exercise because of the belief that exercise will cause pain or harm.

Q4: The name of the disease is placed in (X). Explain in 30-40 words in English what is difficult about the rehabilitation of this disease. <u>You DO NOT need to answer the name of the disease in (X). You can use (X) as it is in your answer text.</u>

(解答例)

- Rehabilitation for (X) is challenging due to its complex pain mechanisms, variable symptom presentation, limited treatment efficacy, and potential for adverse responses to therapies like mirror therapy.
- Rehabilitation for (X) is challenging due to its multifactorial pain origin, diverse symptoms, varying treatment responses, and potential for worsening symptoms with standard therapies like mirror therapy.
- The rehabilitation of patients with (X) presents difficulties because of its complex etiology of pain, diverse array of symptoms, inconsistent responses to treatment, and the possibility of exacerbating symptoms through conventional therapies such as mirror therapy.

Q5: Select the title that BEST fits the sentences and check the box in parentheses (\checkmark).

- (\checkmark) Comprehensive approach to (X) rehabilitation
- () A rare consequence of surgical procedures
- () Insights into minor complications
- () Benefits of physical and occupational therapies
- () ICD-11 revision: (X) as a psychiatric disorder