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Animal Diseases.

Навчальний посібник з англійської мови
для студентів факультету ветеринарної медицини

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Мета посібника –забезпечити розвиток навичок роботи студентів з фаховою літературою, ознайомити студентів з науковими результатами досліджень вчених в деяких напрямках ветеринарної медицини, сприяти швидкому та ефективному засвоєнню студентами необхідного лексичного та граматичного матеріалу та виробленню стійких навичок фахової усної та письмової комунікації. Підручник складається з 3 розділів. Перший розділ має 20 уроків, другий розділ містить граматичний матеріал для самостійного та аудиторного опрацювання , третій розділ містить тестові завдання.

ЖНАЕУ

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Передмова

Навчальний посібник «AnimalDiseases» враховує специфіку фахової тематики та охоплює лексичний матеріал відповідно до навчальних тем. Посібник має на меті оволодіння студентами мовленнєвою компетенцією у сфері тематичного спілкування, розвиток навичок усного та писемного мовлення, читання, розуміння та перекладу англомовних текстів фахової тематики. Система лексико-комунікативних вправ спрямована на практичне засвоєння мовленнєвих елементів фахового стилю. Фахові тексти призначені для аудиторної та самостійної роботи студентів.

Unit 1

Lesson 1. Veterinary Medicine as a science.

Ex.1. Scan the words and their meaning.

In close association- в близькій співпраці з

Intertwined relationship-змішані зв'язки

Establishment-заснування

Share common mechanisms-мати спільні механізми

Disease- хвороба

Disorders- неполадки

Tumors- пухлини

Cardiacdiseases- серцеві хвороби

Furthermore- більш того

Side-effects-сторонні результати(впливи)

Contaminants- забруднювачі

Major contribution- головний внесок

Animalhost-організм, який годує паразитів

Humanwelfare- добробут людей

Safeguards- гарантія, запобігання

Broaden- розширювати

Scope of actions-масштаб дій

Encompass- включати, вмістити

Essentialto- мати значення для

Longevity of- тривалість

Reduce stress- зменшити стрес

Ex.2. Read and translate the text.

It's our pleasure to present a book that contains original research results covering several distinctive aspects of the Veterinary Medicine Science, in which the knowledge has continuously increased over the past decade.

Veterinary and human Medicine have been developed in close association, in part as a reflection of the intertwined relationship found between animals and humans since the establishment of first civilizations. Humans and animals share common mechanisms of disease, thus serving as spontaneous

models for the study of particular disorders, such as tumors and cardiac diseases. Besides, concerns regarding the side-effects of contaminants are on the table, as humans share the same environment with animals and are subject to the same influences, but also humans can be exposed through the food chain.

The Veterinary Sciences are often at the vanguard of research in human diseases and behind the improvements in human health. Many human pathogens have their origins in animal hosts. But animals are a major contribution to human welfare: the quality of animal life with regards to both health and welfare also contributes to the quality of human life, and food-animal health and safety are safeguards against the disruption of the food chain.

Advances in tests and procedures made possible change the animal world and both pets and farm animals enjoy a better quality of life. Accompanying its tremendous development, the Veterinary Medicine also broadened its scope of actions and nowadays it encompasses much more than the Veterinary medical practice.

Veterinary research is also essential to the health and increased longevity of service-and-companion animals and thereby reduces stress in both animals and owners. [3, c. 1]

Ex.3. Give the English equivalents of the following:

Результати досліджень, чіткі аспекти, знання, за останнє десятиріччя, частково як, з часу заснування, перші цивілізації, таким чином, проблеми стосовно, бути в порядку денному, навколишнє середовище, є об'єктом впливу, харчовий ланцюг, якість життя, успіх(рух вперед), домашні улюбленці, уможливити зміни, грандіозний розвиток, розширювати, тварини на службі людей, тварини-друзі.

Ex.4. Answer the following questions:

1. Have Veterinary and Human Science been developed separately or in close association?
2. Do animals and people share common mechanisms of diseases?
3. Give some examples of particular disorders which animals and people share?
4. What influences the animals and the people at the same rate?
5. What else can have effects on people?
6. Are food- animal health and safety the safeguards against the disruption of the food chain?
7. What is Veterinary research essential to?

Ex.5. Say what you know about Veterinary Medicine as a Science.

Ex.6. Make up dialogues on the text using the clues:

1. Areand.....old sciences?
2. Why is it necessary to..... them in close association?
3. Aretypical to both human and animals?
4. Why are human and animals..... to the same influences?
5. Do you think the quality of animal life contributes to the ... of human life?

Lesson 2.The Dairy Cows Welfare.

Ex.1. Scan the words and their meaning.

To lack something- не вистачає

Distinction- відмінність

Consensual- узгоджений

To be defined as-бути визначеним як

To interact- взаємодіяти

Cope with-справитись

Assessment- оцінка

Sufficient space- достатньо простору

To be evaluated- оцінюватись

adrenal glands-над ниркова залоза

pituitary gland- гіпофіз

Eosinopenia- ацидоцитопенія(зменшення кількості еозинофільних гранул в крові)

Manifestation- прояв

Lameness-кульгавість

Ex. 2. Read and translate the text "The Dairy Cows Welfare".

Animal welfare lacks a good universal definition and a satisfactory distinction from the term "well-being". However, a consensual definition is essential for practical, legislative and scientific purposes. Animal welfare is defined as the ability of an animal to interact or cope with its environment, resulting in satisfaction of both physical and mental state.

The assessment of animal welfare is based on the provisions of five freedoms, which include:

- A) Freedom from hunger and thirst.
- B) Freedom from pain, injury and disease.
- C) Freedom from fear and distress.
- D) Freedom to have sufficient space.
- E) Freedom from thermal and physical discomfort.

Assessment of animal welfare can be done using animal-based and environment-related parameters. These parameters can be evaluated using indicators that show the state of the animal such as production performance, physiological, pathological, ethological and integrated factors.

The production performance indicators of animal welfare are growth rate, productivity, reproductive output and duration of productive life of an animal.

The main physiological indicators of welfare are hormone levels from the pituitary and adrenal glands and the changes induced on target organs by these hormones such as tachycardia, blood pressure, hyperglycaemia, lymphocytosis and eosinopenia.

Pathologic signs are widely accepted as indicators of poor welfare because they are a manifestation of current suffering of the animal. Lameness, skin injuries and measurement of immune function are the most commonly used pathological indicators of poor welfare in dairy cattle.

Ethological or behavior indicators are the inability of the animal to carry out normal behavior. Abnormal behavior is a sign that an animal has problems adapting to its environment.

Cattle express synchronized behavior within the herd. On daily basis cows confined and housed spend 5-6 hours eating, 4-9 hours ruminating and 11- 11.5 hours lying down. The reduced eating time reduces standing time. Increased milk yield has been observed in cows with longer lying time. [3, c. 3]

Ex. 3. Give the English equivalents of the following:

Загальне визначення, є визначним для, наукові цілі, задоволення, голод і спрага, хвороба, страх, показники, виробничі характеристики, прояв, молочна худоба, неспроможність, поведінка, надії молока, стадо, знак, навколишнє середовище.

Ex. 4. Answer the following questions:

1. What is “animal welfare”?
2. What “freedoms” are required for assessment of the animal welfare?
3. Which parameters should be used to assess the animal welfare?
4. What are the productive performances indicators?
5. Which glands show the hormone levels?
6. What does abnormal animal behavior indicate?

Ex. 5. Chose and write down the antonymous pairs:

Lack of to increase

Satisfactory to hide

Practical abundance of

To cope to fail

Freedom theoretical

Fearcaptivity

To show courage

To reduce to increase

Ex. 5. Write questions to find the information about the people in your group.

Town/country-----Where.....from?

Family-----married? Have you got ...?

Occupation-----What ...do for living?

Free time-----What in your free time?

Present activity-----What.... at the moment?

Ex .6. Say how important is dairy cowswelfare .

Lesson 3. Dermatology in Dogs and Cats.

Ex.1.Scan the words and their meaning:

Skin- шкіра

Protection- захист

Perception- сприйняття

Due to- завдяки

Pyoderma-гнійна хвороба шкіри

Cause- причина

Surface- поверхня

Fold- складка

Gland- залоза

Superficial-поверхневий, незначний

Pustule-пустула, прищик

To obtain- отримати

Lesion- осередок зараження

Intact-здоровий, не заражений

Debris-відмерла шкіра

Scraping-зіскоблювання

Screening-рентгеноскопія

Ex. 2. Read and translate the text "Bacterial skin Diseases".

The skin is the largest organ of the body with many different functions as thermoregulation, immune protection, sensory perception, vitamin D production and it acts as a barrier between the animal and the environment. Due to these characteristics, dermatologic problems are among the most commonly seen disorders in veterinary hospitals.

Pyoderma is bacterial skin infection and it is among the most common causes of skin diseases in dogs, however, it is less common in cats. Surface pyodermas are characterized by superficial erosions. The surface pyoderma affects the skin folds found in lips, face, vulva, tail and mammary glands of some breeds.

Superficial pyodermas are the most common causes of cutaneous bacterial infection in dogs. They affect the superficial portion of the hair follicles or the epidermis, causing pustules. Superficial bacterial folliculitis is the most common form of pyoderma in dogs. Deep pyoderma does not occur spontaneously, often starting as superficial pyoderma. Diagnosis is obtained through the evaluation of clinical signs, presence of characteristic skin lesions, elimination of other possible causes of folliculitis and by cytological evaluation of the intact pustules content and the skin debris. In the management of the pyoderma it is important to identify the possible underlying disorder, which may be done through the skin scrapings, allergy tests, endocrinopathies screenings, hypoallergenic diet trials and skin biopsies. [3, c. 5]

Ex. 3. Answer the questions to the text.

1. Which functions does skin serve?
2. Why are the dermatologic problems so wide-spread?
3. What causes skin diseases?

4. What can cause the emergence of pustules?
5. How can the doctors make diagnosis of bacterial skin diseases?

Ex. 4. Familiarize yourself with different meanings of particular words:

Skin-----шкіра, обшивка, обгортка, верхній шар, пакувальний папір.

Protection-----охорона, загорожа, пропуск, захист, засоби захисту, оберіг, ізоляція, гарантія, викуп рекетирам, свідоцтво про громадянство Америки.

Immune-----не сприйнятлива до хвороб людина, захищений, вільний від чогось, резистентний, недоторканий.

Ex. 5. Choose adjectives from the text and write them down in degrees of comparison.

Ex. 6. Say what you know about bacterial diseases.

Lesson 4. Fungal Diseases in Dogs and Cats.

Ex. 1. Scan the words and their meaning:

Caused by-спричинений чимось

Fungigenera-рід, вид грибка

Habitat- місце розповсюдження, навколишнє середовище

Transmission- передача

Canine-собачий

Feline- кошачий

Conidia- спори

Alopecic- алопеційний (мед. термін)

Crusted- покритий (шкіркою...)

Limbs- ноги тварини

scales-луска

Hyphae- гіфа (грибок, який росте вгору)

Elimination- знищення, ліквідація

Shaft-стержень

M. canis- собачі мікроспори

Ex. 2. Read and translate the text "Dermatophytosis".

Dermatophytosis is a superficial mycosis caused by *Microsporum* or *Epidermophyton* fungi genera. These fungi are isolated from hair, nails and skin surface since they require keratin for their growth.

Dermatophytosis are classified into three groups based on their habitat: zoophilic, mostly found in animals, occurring transmission to other animals or to humans; anthropophilic, mostly found in humans,

transmitted between humans and rarely to animals; and geophilic, mostly found in the soil, infects humans and animals.

Clinically, canine and feline fungal infections differ. Infections in dogs often produce lesions, while it is possible to isolate dermatophytes from clinically healthy cats, which can act as a conidia reservoir of the fungus. The affected animals usually have alopecic, scaly, crusted and popular lesions, especially in the face and limbs.

The direct microscopic examination of hairs and scales can reveal the presence of fungal hyphae or spores. The fungal culture can be obtained by brushing the animal with a toothbrush or by skin scrapings.

The best strategy for the treatment of dermatophytes is the association of systemic and topical antifungal therapy. The aim of the treatment with topical products are the elimination of the fungi present at the epidermis and hair surface, while systemic treatment aims to eliminate infection within the hair shafts. Lime sulfur rinse at 6.5 % twice a week showed good results in cats infected with *M. canis*. Systemic treatment options include itraconazole orally at 10 mg/kg once a day, griseofulvin 50mg/kg once a day or terbinafine 5mg/kg once a day. The treatment must be extended over 2 to 4 weeks after clinical cure and after obtaining two or more negative fungal cultures. [3, c. 7]

Ex. 3. Answer the questions to the text:

1. What is dermatophytosis caused by?
2. What do Epidermophyton fungi genera require for their growth?
3. What kind of dermatophytosis is mostly found in humans?
4. How can we distinguish a healthy animal from an affected one?
5. What can a direct microscopic examination of hairs reveal?
6. How can the fungal structure be obtained?
7. What is the aim of dermatophytosis treatment?
8. What is the best strategy for dermatophytosis treatment?

Ex. 4. Familiarize yourself with word-combinations:

Habitat conditions- умови навколишнього середовища

Habitat conservation- збереження місця проживання

Habitat degradation- погіршення умов проживання

Habitat destruction- знищення навколишнього середовища

Habitat dislocation- розташування місць проживання

Habitat engineering- тех. засоби захисту навколишнього середовища

Habitat idea- необміркована думка

Habitat loss- втрата місця проживання

Habitat measures- необмірковані заходи

Habitat shifts- зміна місця розповсюдження

Habitat theory- нерозроблена теорія

Ex. 5. Think of the questions to ask about free time activities.

1. Whatin your free time?
2. Whatat the weekends?

3..... any sports?

4.Do you like....?

5.Where.... on holidays?

Ex. 6.Inform the students about the main symptoms of dermatophytosis.

Lesson 5. Sporotrichosis.

Ex. 1. Scan the words and their meaning:

Sporotrichosis- споротрихоз

Dimorphic fungus- диморфний (двохвидний) грибок

Zoonotic- природний осередок

Ulcer- язва

Decaying-те що загниває, чахне

Perforations - перфорація, патологічна діра

Cutaneous- шкіряний

Confinedto- обмежений, локалізований

Inoculation-щеплення

Nodules- вузлики, нарости, згустки

Subcutaneous- підшкірний

Yeastcells-дріжджеві клітини

Pyogranulomatous- піогрануломатозний (вузли на шкірі)

Cellular –пористий, сітчастий, сотоподібний

Compatible-сумісний, поєднаний

Oraladministration-призначення для орального прийому

Ex. 2. Read and translate the text.

Sporotrichosis is a mycosis caused by a dimorphic fungus, which can infect animals and humans. It is a zoonotic disease and transmission to humans occurs through bites or scratches, and contact with cat ulcers. A dimorphic fungus is present in the decaying vegetation and soil, the animal contamination occurs by skin open lesions such as perforations, bites and scratches. Once in the host organism, the fungus may cause local lesions and possibly systemic signs.

Clinically, sporotrichosis has three forms: cutaneous, lymphocutaneous and generalized, and more than one form can occur simultaneously in the same animal. The cutaneous form is usually confined to the area of fungus inoculation and manifests after an incubation period of one month. If this lesion is not treated the progression to lymphocutaneous form can occur. This form is characterized by the development of nodules that evolve into ulcers, affecting skin, subcutaneous tissue and lymph vessels.

The diagnosis is based on clinical history, physical examination, cytological evaluation and fungal culture. Cytological evaluation usually reveals oval or elongate yeast cells consistent with dimorphic fungus form and inflammatory cells may also be present. On histopathology, the presence of deep pyogranulomatous dermatitis, cellular infiltration of mononuclear cells, and the presence of positive structures compatible with dimorphic fungus may be observed. Oral administration of itraconazole 10 mg/kg every 24 hours is the treatment of choice. [3, c. 9]

Ex. 3. Answer the questions to the text:

1. Can sporotrichosis infect both humans and animals?
2. How does transmission of sporotrichosis to humans occur?
3. Where is dimorphic fungus present?
4. What can dimorphic fungus cause?
5. Can a few forms of sporotrichosis occur simultaneously?
6. What is diagnosis based on?
7. How can sporotrichosis be treated?

Ex. 4. Familiarize yourself with word-combinations:

Decay curve- крива сходження вниз

Decay electron- бета-частинка

Decay factor- коефіцієнт розпаду

Decay heat-теплота радіоактивного розпаду

Decay of personality- деградація особистості

Decay period- період на-піврозпаду

Decay probability- імовірність розпаду

Decay resistance- стійкість до гниття

Decay time- час завершення розпаду

Ulcer base- дно виразки

Ulcer bed- основа виразки

Ulcer perforation- прободіння виразки

Syria ulcer- дифтерія

Stress ulcer стресова виразка-

Rodent ulcer- роз'їдаюча виразка

Peptic ulcer disease- виразкова хвороба

Ex. 5. Complete the sentences with the ideas about you.

1. One day I want to....
2. I can but I can not...
3. Right now I would like to...
4. Tonight I am going to....

5. I enjoy...because I like...

6. Ex. 6. Inform the students about the main symptoms of sporotrichosis.

Lesson 6. Parasitic Skin Diseases.

Ex. 1. Scan the words and their meaning:

Inflammatory- запалювальний

Mite- кліщ

Sebaceous-сальний

Offspring- потомок

Generalized- типовий, узагальнений

Affected- вражений

Contraindicated- протипоказаний

Erythema- почервоніння

Comedones- вугрі

Alopecia- облисіння

Follicularcasts- фолікулярні циліндри

Trichogram-трихограма

Resolve- проходити, закінчитися

Approach- підхід

Acaricidal- акарицидний(знищує кліщів)

Concurrent- одночасно діючий

Underlying- що лежить в основі

Access- мати доступ

Adverse- шкідливий

LimeSulphur- вапняково-сірковий

Ex. 2. Read and translate the text "Demodicosis".

Demodicosis is a very common skin disease in dogs but rare in cats. It is an inflammatory disease, in which large amounts of Demodex mites are found in the skin. Mites proliferate in the hair follicles and sebaceous glands causing the disease. It is a common condition and it is often serious in dogs. The mites are transferred from the mother to the offspring in the early life. Genetic factors are probably very important in the development of generalized disease and therefore, breeding of affected animals is contraindicated.

Erythema, comedones, scaling, partial or complete alopecia, follicular casts, pustules, and in severe cases, furunculosis crusting exudation can be clinical signs. Generally, the lesions begin on the face and limbs, but they may become generalized. Demodicosis can be classified into generalized and localized. The involvement of one complete body region, five or more local areas, or the involvement of the legs is considered generalized demodicosis. The diagnosis is made by deep skin scrapings or trichogram.

In most dogs, localized demodicosis resolves spontaneously, thus mite-specific therapy is not necessary until the disease generalizes. The treatment of generalized demodicosis involves several approaches. In addition to the acaricidal treatment, the concurrent secondary infections and underlying diseases should be also accessed. As an acaricidal treatment, ivermectin is recommended at 0.3 to 0.6mg /kg orally once a day, however, it is recommended to begin the treatment with a lower dose and gradually increase the amount of drug administered. The animal should be monitored for the appearance of adverse effects. Therapy with moxidectin 0.2-0.5 mg/kg orally once a day and doramectin 0.6mg/kg orally were proved effective in the treatment of generalized demodicosis. In cats weekly baths with 2% lime sulfur are indicated for the treatment of demodicosis. [3, c. 11]

Ex. 3. Answer the questions to the text:

1. What kind of disease is demodicosis?
2. Where do the mites proliferate?
3. When are the mites transferred to the offsprings?
4. What clinical signs of a disease do you know?
5. What do you know about the demodicosis classification?
6. How is demodicosis diagnosis made?
7. How is demodicosis treated?

Ex. 4. Familiarize yourself with word combinations:

Resolve-(ім.)- рішення, готовність, намір.

(дієсл.)- вирішити, винести резолюцію, задумати, затухати(біль), підвести підсумок, відділити (в аналізах), належати компанії(ІРадреса)

Transfer- (дієсл.)перенести, передати, перерахувати, передати у власність, перетворити, переадресувати, перевезти, перекинути.

(ім.) –передача, акт передачі, соціальна виплата, доставка повідомлення, передача(даних, знань).

Ex. 5. Discuss with a partner:

1. Do you like learning English? Is it difficult? How to improve your language skills?
2. Would you like to learn any other languages? Why?
3. Do you like to study? What are the advantages of being educated?

Ex. 6. Inform the students about the main symptoms of demodicosis.

Lesson 7. Canine Scabies.

Ex. 1. Scan the words and their meaning:

Canine scabies- собача чесотка

Pruritus- почесуха

Gallery- прохід

Stratumcorneum- роговий шар епідермісу

Hatch- висижувати, виношувати

Larvae-личинки

Irritating- надоїдати, досаждати

Pruritic- сверблячий

Papulareruption-вузликово-пузирчасті висипання

Exudation- виділення (через пори)

Pustules- прищі

Confinedto- ізолюваний, обмежений

Pinna- вушна раковина

Hocks- підколінне сухожилля

Pinnal-pedal-“вуха-ноги”

Ipsilateral- розташований з того ж боку

Ex. 2. Read and translate the text.

Canine scabies is a common condition in dogs and humans but rare in cats, in which the skin is colonized by *Sarcoptes scabiei* mite after contact with a donor host. The infestation with these mites results in intense pruritus. Female mites dig galleries in the stratum corneum in order to lay their eggs that hatch, releasing larvae forms that migrate to the skin surface, where they reach the adult stage.

Extremely irritating and pruritic papular eruption, skin thickening, erythema, alopecia, exudation with crust formation and secondary bacterial infection with pustules are common clinical findings. Chronic lesions are usually confined to the margins of the pinna, elbows and hocks that may present skin thickening, minimal crust formation and persistent pruritus.

Skin scraping with microscopic identification of *S. scabiei* is a valuable diagnostic method, although mites are hardly seen in many cases. Diagnosis is usually based on animal's history, clinical signs and a positive pinnal-pedal reflex (pinna margins are gently scratched and the dog will reflexively use an ipsilateral hind to scratch the source of the irritation).

The treatment is recommended to the patient and other animals in their household. Bathing with 0.025% amitraz solution once weekly or twice weekly is recommended as an effective treatment. The therapy should be continued for two weeks after clinical signs remission. Adverse side effects should be monitored during the treatment. Fipronil spray 0.25% can be applied three times with a three week interval on puppies. Ivermectin can be administered at 0.2 to 0.4 mg/kg every seven days. This drug is contraindicated in Collies and their crosses. [3, c. 12]

Ex. 3. Answer the questions to the text:

1. Who can suffer from canine scabies?
2. Where do the mites lay their eggs?
3. What are common clinical symptoms of scabies?

4. What is a diagnostic method for identification of scabies?
5. What is a diagnosis based on?
6. What prescription does the vet make?

Ex. 4. Practice these sentences with a partner. Make up your own ones:

1. It isn't as cold today as it was yesterday.
2. But it's colder than it was last week.
3. I'm not as tall as you, but I'm taller than Anna.
4. This car is more expensive than John's.

Ex. 5. Inform the students about canine scabies.

Lesson 8. Allergic Diseases.

Ex.1. Scan the words and their meaning:

Ctenocephalides-під блох

Ectoparasite- ектопаразити (котів і собак)

Infestation-зараження

Self-inflicted-нанесений собою

Sensitization-підвищена чутливість

Erythema- почервоніння

Excoriation- царапина

Crusting- утворення шкірки

Caudal-задній, хвостовий

Ventralabdomen- передня черевна порожнина

Pyotraumatic-травматично- абсцесовий

Circumstantial evidence- явне свідчення

Collar- комір

Ex. 2. Read and translate the text "Flea Allergy Dermatitis".

Ctenocephalides is the most important ectoparasite in dogs and cats in many countries. Its infestation may cause intense pruritus, self-inflicted trauma and even severe symptoms of anemia. Some animals will develop a severe condition known as flea allergy dermatitis. After the sensitization, the lesions may be initiated by only a few flea bites. Flea allergy is one of the most frequent conditions in dogs, especially in humid and warm weather countries, where fleas are commonly found. The most common clinical signs are erythema, excoriation, crusting pustules that usually affect the medial caudal aspect of forelegs and ventral abdomen; pyotraumatic dermatitis may also be observed.

Diagnosis is based on circumstantial evidence, such as clinical response to flea control. A successful treatment for flea allergy dermatitis depends on eliminating of allergy source, the flea. Therapy goals are the total elimination of flea population in the patient's body, as well as in contact animals. It is also important to prevent new infestation, what is not always simple, as fleas have a high reproductive

capacity and a complex life cycle. Products like fipronil, imidacloprid, metaflumizone, selamectin proved to be efficient to control fleas in animals with flea allergy dermatitis. These products are available in several presentations as shampoo, collars, spray, powder, oral medication. [3, с. 13]

Ex. 3. Translate into English:

1. Зараження ектопаразитами може викликати сильне свербіння і навіть анемію.
2. Кілька укусів блохи можуть привести до облісіння.
3. Алергія на блох типова для собак, особливо в жарких і вологих країнах.
4. Загальні клінічні ознаки алергічного дерматиту є почервоніння, царапини, утворення прищів.
5. Діагноз базується на клінічній реакції на блох.
6. Мета терапії це повне обмеження популяції блох на тілі тварини.

Ex. 4. Match the words:

Ladies	don'ts
Fish	pepper
Now	then
Yes	quiet
Do's	anddown
Up	chips
Peace	sound
Safe	gentleman
Salt	no

Ex. 5. Think of the questions to ask each other:

1. Do you like to/play/go/have....?
2. Can you ride/speak run/use...?
3. Did you go/ have/ win/do... last night?
4. Are you going to /good at afraid of...?
5. Have you got a car/ a CD player/a cat...?
6. Have you ever treated a cat/a dog/apet/a cow...?
7. Have you ever diagnosed any diseases/cases/...?

Ex. 6. Inform the students about flea allergy dermatitis.

Lesson 9. Adverse Food Reaction.

Ex. 1. Scan the words and their meaning:

Adverse-побічні, несприятливі

Occurrence- поява

Gastrointestinal-кишково-шлунковий

Assigned to- відноситься до, призначений для

Additives-добавки

Mediated- зумовлений

Idiosyncrasy- характерні особливості, індивід. непереносимість

Pruritic - свербіння

Cutaneous-шкіряний

Perineum- зона між ногами

Vomiting- відригування, блювання

Resolution- зникнення

Ex. 2. Read and translate the text "Adverse Food Reaction".

Adverse food reactions are described in veterinary medicine since 1920, reporting the occurrence of gastrointestinal signs and skin reactions in response to food allergies. Adverse food reaction refers to any abnormal clinical response assigned to consumption of food or its additives. This reaction is classified as food allergy (immune- mediated) or food intolerance(non-immune-mediated). The majority of reactions in animals are food intolerances and they can be of pharmacological or metabolic origin, poisoning, idiosyncrasy, toxicity or anaphylactic to the food. There are some dogs with pruritic skin diseases or otitis which resolves with restrictive diet, but it remains unproved the immunologic cause or hypersensitivity (allergy) associated with cutaneous adverse food reactions.

There are no breed, sex or age predispositions to the occurrence of clinical signs. Pruritus is the most important sign reported and it affects mainly the face, perineum and ears. Gastrointestinal signs as vomiting and diarrhea can also be observed. The best diagnostic approach for cutaneous adverse food reaction in dogs and cats is feeding them with a diet, with only one source of protein that the animal has never been in contact before (novel protein). The diagnosis is obtained with the resolution of clinical signs after the diet trial and with the return of these signs when the previous diet is offered again. The diet trial should be implemented for at least six weeks. Prescription diets, commercially available in some countries, are made of an unusual protein source and a non-allergic carbohydrate source such as potato or oat meal. Lamb, duck, rabbit meat are protein sources usually found in these diets. Another portion considered really hypoallergenic is the hydrolyzed diet. For human it is known that most food allergens are glycoproteins. The possibility of adverse food reaction to hydrolyzed food in sensitive dogs is rare but should be considered. [3, c. 15]

Ex. 3. Answer the question to the text:

1. What symptoms can occur in response to food allergies?
2. Can food intolerance be revealed in poisoning, idiosyncrasy, toxicity?
3. Are there any predispositions to the occurrence of different signs of the adverse food reaction?
4. What is the best diagnostic approach for adverse food reaction in dogs and cats?
5. What are the diets for cats and dogs based on?
6. How long should cats and dogs be on a diet?

Ex. 4. Give advice to your friends:

1. My cat is ill.
2. I've got exams next week.

3. I'm overweight.

Ex. 5. Put the words in the correct order to make sentences:

1. Weather/is/like/in/the /November?
2. Take/clothes/what/should/I?
3. Food/you/recommend/do/what?
4. You/got/have/pets/any?
5. Your/have/any/had/pets/problems/health?

Ex. 6. Inform the students about the adverse food reaction.

Lesson 10. Atopic Dermatitis in Dogs.

Ex. 1. Scan the words and their meaning:

Canine- собачий

Atopic- алергічний, незвичайний

Inflammatory- запальний

Pruritic- сверблячий

Incidence- сфера розповсюдження, частота захворюваності

Manifest- проявити

Lesions-осередок зараження

Macules- плями

Papules- прищі

Concave-вигнутий

Pinna- вушна раковина

Ventral-брюшний

Abdomen- живіт, брюхо

perineum- зона між ногами

Fittingin- те що підходить чомусь

Reinforce- підсилити

Highlight- висвітлити

Pollens- пилок

Curative- лікувальний засіб

Calcineurin- кальціневрин (мед. препарат)

Ex. 2. Read and translate the text "Atopic Dermatitis in Dogs".

Canine atopic dermatitis is an allergic, hereditary, inflammatory and pruritic skin disease, with characteristic clinical signs associated with immunoglobulin E production against environmental allergens. Atopic dermatitis also affects cats, but its incidence is lower than in dogs.

Most dogs with atopic dermatitis begin to manifest signs between six months and three years of age. There is no sex predispositions and clinical signs. Usually patients have a history of pruritus with or without secondary skin or ear infections. Primary lesions include macules and papules, but frequently, patients are presented with secondary lesions from self-inflicted trauma. Lesions affect face, concave part of pinna, ventral aspect of neck, abdomen, perineum ventral aspect of the tail, feet and ears. In dogs as in human beings there is no pathognomonic sign of atopic dermatitis that could provide a diagnosis based only on history and physical examination. Diagnosis depends on patient fitting in several criteria associated with the condition and elimination of different diagnosis. Following clinical diagnosis, laboratory and clinical tests as allergy tests and histopathology, reinforces the diagnosis. However, these tests should not be used to establish the diagnosis but to confirm it. It is important to highlight the fact that some dogs with inflammatory and pruritic skin diseases, displaying clinical signs identical to those found in Canine atopic dermatitis, may have no Immunoglobulin E production in response to environmental allergens. This condition is known as "canine atopic like dermatitis". Other dermatitis might share similar signs with canine atopic dermatitis or could be concurrent disease and that is why they should be eliminated or controlled before the conclusive diagnose of Canine atopic dermatitis. Allergens generally related to canine atopic dermatitis are domestic dust mites, mold spores, trees and grasses pollens, antigens from insects and epidermis.

Atopic dermatitis is one of the most common skin diseases in dogs, but its pathogenesis is not completely understood, so there is no curative therapy available yet. Currently available treatment is: specific allergy immunotherapy, corticosteroids, calcineurin inhibitors, anti-histamines and essential fatty acids. [3, c. 17]

Ex. 3. Answer the questions to the text:

1. What kind of disease is atopic dermatitis?
2. Who can atopic dermatitis affect?
3. When do the dogs begin to manifest first signs of atopic dermatitis?
4. Where are the lesions located?
5. What does diagnosis depend on?
6. Is atopic dermatitis a common or a rare disease?
7. What treatment for atopic dermatitis is currently available?

Ex. 4. Give advice to your friend:

1. I'm always arguing with my parents.
2. It's my friend's birthday soon.
3. I badly need English for my job.

Ex. 5. Match the nouns to make new words.

Alarm	cream
Car	glasses
Traffic	table
Credit	coat
Ice	lights
Sun	card

Time park

Rain clock

Ex.6. Make the words by adding – ed or -ing.

(Ed- adjectives describe how people feel;

Ing-adjectives describe a situation, a person or a thing.)

Exist-

Frighten-

Bor-

Interest- ed

Confus- ing

Disappoint-

Worry/worri

Surprise-

Ex.7. Inform the students about atopic dermatitis in dogs.

Lesson 11. Immunologic Skin Diseases.

Ex.1.Scan the words and their meanings:

pemphigus - пухирчатий, пемфігус;

complex - складний, комплексний;

result - явл.результатом, походити;

intercellular - міжклітинний;

bulla - пухир;

deposition - відкладення,наліт;

promote - сприяти;

release - вивільняти;

occur	- з'являться;
disorder	- розлад;
aggravate	- погіршувати;
breed	- порода;
erythematosus	- еритеми;
foliaceus	- листовий;
observe	- спостерігати;
treatment	- лікування;
response	- реакція;
reduce	- зменшувати;
gradually	- поступово.

Ex.2 Read and translate the text “Immunologic Skin Diseases”.

Pemphigus complex diseases result from the production of autoantibodies directed against epidermal intercellular content, resulting in cell separation with intraepidermal bullae formation. The deposition of antibodies promotes the physical separation of the cells, moreover, it is believed that the release of cell proteases occur, which digests the intercellular substance, further aggravating the condition. Among the forms observed in dogs and cats are pemphigus erythematosus, pemphigus vulgaris, pemphigus vegetans and pemphigus foliaceus, the latter being the most common autoimmune skin disorder in these species, which will be discussed in this chapter.

Pemphigus foliaceus is observed more frequently in middle-aged animals, especially in domestic short-haired cats and in dogs of some predisposed breeds such as Bearded Collies, Japanese Akitas, Chow Chows, Doberman Pinchers and Newfoundlands

Therapy requires the use of immunosuppressants or immunomodulators. Prednisone, prednisolone and methylprednisolone are commonly used in the treatment of pemphigus. Initially it is recommended a dose of 2.2 to 4.4mg/kg every 24 hours, for all three drugs. If therapeutic response is seen in 14 days, the dosage should be reduced gradually over 30 to 40 days. After this, an alternate day dose should be implemented, reaching a final protocol of 1 mg/kg every 48 hours or less. [4, c. 36]

Ex.3. Give English equivalents of the following word combinations:

Походити від; складне захворювання; пухирчасте захворювання шкіри; міжклітинний вміст; відокремлення клітин; перетравлювати речовину; погіршувати стан; розлад;

короткошерсті коти; порода; вимагати імуномодуляторів; лікування; терапевтична реакція; денна доза; сприяти діленню.

Ex.4. Answer the questions:

1. What does pemphigus complex disease result in?
2. What does the deposition of antibodies promote?
3. What forms of pemphigus diseases are observed in dogs and cats?
4. Where is pemphigus foliaceus observed?
5. What does the therapy require?
6. What medicines are commonly used in treatment?
7. When is the therapy effect usually seen?

Ex.5. Dictionary work – find the synonyms to the words:

production	to aggravate	to promote
to result	common	use
to occur	treatment	

Ex.6. Complete the table:

Verb	Noun	Adj.
to occur	-	-
-	aggravation	-
-	-	treating
-	reduction	-
to release	-	-

Ex.7. Inform the group about immunologic skin diseases.

Lesson12. Metabolic and Endocrine Diseases.

Ex.1.Scan the words:

hypothyroidism	-	знижена функція щитовидної залози
associate	-	пов'язувати
reduce	-	зменшувати
thyroidgland	-	щитовидна залоза
adult	-	дорослий
maintenance	-	підтримка, утримування
report	-	повідомляти, реєструвати
coatquality	-	якість хутра
alopecia	-	облисіння
pyoderma	-	гнійний верхній шар шкіри
superficial	-	поверхневий
desquamatedskin	-	шкіра,що лущиться
brittle	-	ламкий
healing	-	лікування, заживлення
wound	-	рана
appropriate	-	відповідний, належний
obesity	-	тучність
pili	-	волосяний

Ex.2. Read and translate the text “Hypothyroidism”.

Hypothyroidism is an endocrine disorder associated with a reduced production of T4 and T3 hormones by the thyroid gland. Rarely affects cats, however, is the most common endocrinopathy in dogs. The primary destruction of the thyroid gland occurs in more than 95% of adult dogs with hypothyroidism. Thyroid hormones are extremely important in the maintenance of normal skin function, and dermatologic conditions are reported in 60 to 80% of hypothyroidism cases. Usual findings are changes in the coat quality and color, alopecia,

superficial pyoderma, dry and desquamated skin, dry or oily seborrhea, brittle and easily pulled hairs, hyperpigmentation, comedones, otitis, deficient healing of wounds, myxedema and obesity.

Diagnosis is based on clinical signs and on serum total TSH and freeT4. Histopathology may show highly suggestive signs of hypothyroidism as follicle atrophy, hyperkeratosis, epidermal melanosis, hypertrophy and vacuolization of pili muscles and thickened dermis.

Oral sodium levothyroxine (T4), 20 mg/kg twice daily is suitable for hypothyroidism. The patient should receive appropriate treatment for dermatologic conditions presented, although they tend to disappear with the sodium levothyroxine application. [3,c.37]

Ex.3. Give English equivalents of the following word combinations:

Ендокринний розлад; зменшене виробництво; вражати собак; гормон щитовидної залози; підтримка нормального стану шкіри; знижена функція щитовидної залози; змінювати якість хутра; поверхнєве загоювання; клінічні ознаки; відповідне лікування.

Ex.4. Answer the questions:

1. What is hypothyroidism associated with?
2. What animals does it affect?
3. Where does the primary destruction of thyroid gland occur?
4. What are thyroid hormones especially important for?
5. What dermatologic changes usually occur in cases of hypothyroidism?
6. What is diagnosis based on?
7. What treatment is appropriate?

Ex.5. Complete the sentences choosing the words given below:

(Disappear, maintenance, affects, reduced, destruction)

1. Endocrine disorder is connected with ... production of T4 and T3 hormones.
2. Hypothyroidism rarely ... cats.
3. Thyroid hormones are extremely important in the ... of normal skin function.
4. 95% of adult dogs with hypothyroidism have got primary ... of thyroid gland.
5. Clinical signs ... with the application of sodium levothyroxine.

Ex.6. Inform the group about hypothyroidism.

Lesson 13. Keratinization Disorders.

Seborrhea.

Ex.1 Scan the words:

primary	- первинний
secondary	- вторинний
inherit	- успадковувати
exhibit	- проявляти
predisposition	- схильність
appear	- з'являться
hereditary	- спадковий
excessive	- надмірний
desquamation	- шелушіння
sicca	- сухість
oleosa	- масло, масляний
opaque	- непрозорий, матовий
adhesion	- прилипання
pruritus	- зуд
keratinization	- ороговіння
eliminate	- знищувати, ліквідувати
scraping	- соскоб
evaluation	- оцінка
scale	- луска
crust	- корка
removal	- усунення

Ex.2. Read and translate the text "Seborrhea":

Seborrheic dermatitis is a skin keratinization disorder which can be primary or secondary. Primary keratinization disorders are inherited and exhibits breed predisposition. Usually, clinical signs appear before two years of age. About 90% of the cases are secondary to an underlying

disease such as metabolic, hereditary or nutritional disorders, that cause excessive skin desquamation.

Seborrhea is classified in seborrhea sicca or oleosa according to hair and skin appearance. In seborrhea sicca the coat is opaque and dry, containing aggregates of white to greyish scales, and in seborrhea oleosa there are adhesions of yellowish to brown lipid material with greasy appearance. Animals often exhibit pruritus, folliculitis, pyoderma, inflammation and hyperkeratosis plaques formation.

Diagnosis is based in history, clinical signs, physical examination findings and complementary exams to eliminate differential diagnosis or to determine the primary disease. It is necessary to perform skin scrapings, fungal and bacterial cultures, allergy tests, endocrine function evaluation, skin biopsy and evaluation of therapy response to close the diagnosis.

Seborrhea treatment goals are scales and crusts removal and oil, pruritus and inflammation reduction. Cases of primary idiopathic seborrhea could be treated with oral Vitamin A (600 to 800 UI/kg, twice daily) or with retinoids as isotretinoin and etretin (1 or 2 mg/kg a q12h). Salicylic acid and sulfur shampoos are recommended and might have positive effect in moderate cases. Secondary cases have an excellent prognosis when the underlying disease is eliminated, while primary keratinization disorders demand lifelong control and treatment.[3,c.41]

Ex. 3. Give English equivalents:

первинний розлад; ороговіння шкіри; спадкове захворювання; схильність породи; надмірне шелушіння; зовнішній вигляд шкіри; матова та суха шкіра; визначати діагноз; оцінка терапевтичної реакції; лікувальні цілі; ліквідувати хворобу; складні випадки жирної себореї.

Ex.4. Answer the questions:

1. What kind of disorder is seborrheic dermatitis?
2. Is seborrheic dermatitis an inherited disease or is it a breed predisposition?
3. What causes an excessive skin desquamation?
4. What do animals exhibit?
5. What is diagnosis based on?
6. What is it necessary to perform to determine the primary disease?
7. What does histopathology reveal in epidermis and hair?
8. How can seborrhea be treated?

Ex.5. Translate into English:

1. Ороговіння шкіри – це себорейний дерматит.

2. Надмірне шелушіння може бути спричинене метаболічними, травленими або спадковими розладами.

3. При себорейній шерсть стає матовою і сухою.

4. При жирній себорейній з'являються налипання жовтуватого та коричневого ліпідного матеріалу, що має жирний вигляд.

5. Лікування себорейній направлене на усунення луски, корок та жиру.

6. Саліцилова кислота та шампуні з сіркою дають хороші результати в більшості випадків.

Ex.6. Discuss keratinization disorders with your groupmate (work in pairs).

Lesson 14. Psychogenic Diseases.

Ex.1 Study the words:

lick	- лизнути
ulcerated	- покритий виразками
proliferative	- поширений
alopecic	- лисий
plaque	- виразка
compulsive	- обов'язковий
distal	- віддалений, периферійний
limb	- кінцівка
sorely	- жорстоко, виснажливо
pruritic	- що зудить
lesion	- ушкодження
elimination	- очищення, видалення
behavioral	- поведінковий

stimulus	- подразнювач
notorious	- сумнозвісний
exposure	- нараження.

Ex.2. Read and translate the text:

Lick dermatitis is characterized by ulcerated, proliferative, firm and alopecic plaques, derived from compulsive licking of the distal portion of the limbs. Secondary bacterial infection is frequent and contributes to the sorely pruritic nature of the lesions. This condition may originate from psychogenic (fear, and/ or anxiety-based conditions), dermatologic (secondary to hypersensitivity, demodicosis, neoplasma and fungal or bacterial infections), traumatic, neuropathies or articular diseases.

Diagnosis requires complete clinical evaluation, complete blood cell count, serum biochemical profile and urinalysis. Only after the elimination of possible organic causes for acral lick dermatitis, it can be considered a behavioral disorder. In this case, the animal behavior should be evaluated, with the observation of its environmental and social stimuli and their motivational status. Treating acral lick dermatitis is notoriously challenging. The animal's environment should be modified to eliminate or minimize their exposure to stress factors, and the use of antidepressives as fluoxetine 20 mg/day may help significantly in compulsion control which improves the lesions. [3,c.42]

Ex.3. Complete the sentences:

(exposure, causes, help, cell, contributes, behavioral)

1. Bacterial infection ... to the sorely pruritic nature of the lesions.
2. Diagnosis requires complete blood ... count.
3. It is necessary to eliminate possible organic
4. Lick dermatitis may be caused by a ... disorder.
5. While treating lick dermatitis one should minimize animal's ... to stress factors.
6. Using antidepressives may ... significantly to improve lesions.

Ex.4. Give English equivalents:

Походити від; облісілі виразки; зализування; віддалені частини кінцівок; бактеріальне зараження; сприяти свербіж; пошкодження, викликані свербіжем; даний стан походить; психогенні розлади; страх; неспокій; гіперчутливість; грибкова інфекція; повна клінічна оцінка; поведінкові розлади; навколишні подразнювачі.

Ex.5. Translate into English:

1. Цей собака покритий виразками.

2. Він постійно вилизує віддалені частини своїх кінцівок.
3. Через вторинне бактеріальне інфікування пошкодження, викликані свербіжем , складно лікувати.
4. Перед встановленням діагнозу необхідно провести повну клінічну оцінку стану тварини.
5. Дерматит можна вважати поведінковим розладом лише після виключення органічних причин.
6. Психогенні умови (такі, як страх, неспокій) можуть викликати дерматити.

Ex.6. Discuss the situation - “ My dog has got some dermal problem” (pair work).

Lesson15. Non-Infectious Diseases.

Ex.1. Scan the words:

Observe	- спостерігати
frequently	- часто
pericarditis	- перикардит
accumulation	- накопичення
wire	- дріт
substance	- речовина
extent	- міра
needlesharp	- гострий, як голка
penetrate	- проникати
lodge	- розташовувати, лежати
involvement	- (мед.) ураження
hazardous	- загрозливий
affect	- вражати (хворобою)

beneficial	-	сприятливый
sporadic	-	поодинокий

Ex.2. Read and translate the text:

Non-infectious diseases include those conditions that are not grouped, or, they are isolated. In animal medicine it is correct to state that sporadic diseases are not epizootic. In further explanation, the understanding of sporadic diseases is that they affect only isolated animals here and there, and with no particular relationship in their occurrence.

Traumatic pericarditis. This disease is observed most frequently in cattle and other ruminants. It is essentially an accumulation in the digestive tract of foreign bodies such as nails, bolts, pieces of wire and other hard substances.

In ruminants these foreign bodies are almost always present to some extent in the reticulum. Many of these foreign bodies, as a result of partial solution or corrosion, become needlesharp so that they penetrate the wall of the digestive tract in which they are lodged, to travel in various directions. As a sequence of the normal stomach contractions, it is very common for the sharp-pointed foreign body to be forced in a forward direction so that its tip ultimately penetrates the heart sac (pericardium), or it may actually enter it. The latter case is almost invariably followed by death of the patient. This heart involvement is known as traumatic pericarditis.

Prevention to a considerable extent is possible and practical. In some instances the careful screening of the finest foods has been an additional precautionary preventive step.

Veterinarians can successfully remove these foreign bodies from the digestive tract by surgical means, and operations on the heart sac have been performed. Unfortunately, however, in early stages of the disease when surgical treatment will do the most good, the clinical symptoms are not so pronounced that a diagnosis is clear-cut, and finally when the heart and its sac are affected, it is usually too late to expect beneficial results. [4, c.22]

Ex.3. Fill in the gaps:

(penetrate, isolated, observed, epizootic, remove, reticulum, beneficial)

1. In animal medicine sporadic diseases are not
2. Sporadic diseases affect only ... animals here and there.
3. Traumatic pericarditis is most frequently ... in cattle and other ruminants.
4. In ruminants these foreign bodies are always present in some extent in the
5. Many of these foreign bodies become needlesharp so that they ... the walls of the digestive tract.
6. Veterinarians can successfully ... these foreign bodies by surgical means.
7. When the heart and its sac are affected, it is too late to expect ... results.

Ex.4. Form synonymous pairs:

- A. Frequent, observe, extent, penetrate, dangerous, affect, accumulate, means.
- B. Hoard, watch, soak, often, hazardous, rate, measures, strike.

Ex.4. Answer the questions:

1. What is meant by sporadic disease?
2. Where is traumatic pericarditis most frequently observed?
3. Are hard substances sometimes present in animal stomach?
4. Why do foreign bodies become needlesharp?
5. Where can they penetrate?
6. Is it possible to remove these foreign bodies by surgical means?
7. When can we expect beneficial results?

Ex.5. Prepare a short information to your groupmates on traumatic pericarditis.

Lesson 16. Infectious and Contagious Diseases.

Ex.1. Scan the words:

Distinguish	- виділятись
distinction	- різниця, розходження
herd	- стадо
flock	- отара
contagious	- інфекційний, контагіозний
primarily	- первинно
dueto	- через
germ	- мікроб, бактерія

lesion	- враження, ушкодження
subside	- спадати, падати
ailing	- що хворіє, нездужає
apparently	- явно, очевидно
visible	- видимий
thrifty	- швидко зростаючий, процвітаючий.

Ex.2. Read and translate the text:

In this classification there are grouped those diseases that are due to germs. Infectious diseases are distinguished from the contagious diseases in that the latter are “catching” or communicable, they are much more widespread. Infectious diseases frequently affect only one animal of a herd or flock.

Infectious enteritis in pigs. This is one of the very serious infectious swine diseases occurring very often. Primarily the disease is due to a germ known as the *Salmonella suis* pestifer though its principal lesions and symptoms are the effect of the necrosis germ. The two always go hand-in-hand in the production of swine dysentery.

Very frequently an outbreak may be traced to the recent introduction of new members into the herd. It is usually independently present on quite a large number of hog-raising farms.

The outstanding symptom of the disease is a bloody diarrhea. When this appears within a week or two after new additions to a herd a diagnosis of swine dysentery may be considered to have been established. The animal's temperature at first high usually subsides as the diarrhea sets in. Sometimes the disease becomes chronic in its character so that ailing pigs do not die though remaining permanently unthrifty.

The best method of prevention is not to introduce newly purchased swine into a herd until they have first been held in quarantine for three weeks.

When the disease has established itself in a herd it is advisable to separate at once the apparently well animals from those visibly ill. The former should be placed in clean quarters that have not been occupied by swine for sometime previously. The ration should be easily digestible – buttermilk tinged a very light blue color by passing through it a small bag filled with sulphate of copper crystals, has been recommended. Nicotinic acid has also been advised as a specific in the early stages of the disease.

Ex.3. Fill in the gaps:

(diarrhea, affect, subsides, lesions, quarantine, die)

1. Infectious diseases frequently ... only one animal of a herd or flock.
2. Enteritis principal... and symptoms are the effect of necrosis germ.
3. The outstanding symptom of the disease is a bloody...
4. The animal's temperature usually...as the diarrhea sets in.
5. In chronic form ailing pigs do not ..., but remain unthrifty.
6. To prevent the disease newly purchased swine should be held in ... for 3 weeks.

Ex.4. Form synonymous pairs:

- A. Primarily, due to, apparently, ailing.
- B. Unthrifty, visible, because of, initially.

Ex.5. Give English equivalents:

Інфекційне захворювання; первинні симптоми; через бактерії; ураження та симптоми; вражати одну тварину; дія некротичного мікробу; висока температура; постійно нездорова тварина; очевидно здорова тварина; раціон, що легко перетравлюється.

Ex.6. Translate into English:

1. Хвороба з'являється через мікроб, відомий, як сальмонела.
2. Некротичний мікроб часто вражає лише одну тварину із стада, чи отари.
3. Найчастіше страждають молоді 4-5-місячні свині.
4. Брак вітаміну В є передумовою захворювання на ентерит.
5. Висока температура спадає з появою діареї.
6. Радимо відразу відділити явно здорових тварин від очевидно хворих.

Ex.7. Make up dialogues on the text using the clues:

- What causes infectious enteritis?
- How may the outbreak be traced?
- What is the outstanding symptom of the disease?
- Can it become chronic?
- Is there any prevention method?
- What do you know about the ration of sick animals?

Lesson 17. Tuberculosis.

Ex.1. Scan the words:

contaminate - заражати, забруднювати

solid - твердий

laden - навантажений

processing - переробка

creamery - маслобійня

hog - кнур

infected - інфікований

carcass - туша

excreta - екскременти

acquire - набувати

vary - відрізнятись, змінюватись

cough - кашляти

inoculation - щеплення

evidence - доказ, свідчення

testing - перевірка, тестування

slaughter - забій

reliable - надійний

suspect - підозрювати

swelling - пухлина

brain - мозок

joint - суглоб

testicle - (анатом.) яєчко

Ex.2. Read and translate the text:

This is a chronic contagious disease of man and animals. Of the latter cattle, hogs, and poultry are the commonly affected ones. Man, poultry, and the remaining groups of commonly affected animals are each most easily infected by their own specific bacillus of tuberculosis.

Infection takes place by the consumption of tuberculosis-germ-contaminated liquid and solid food, and by breathing germ-laden air. Thus calves may get the disease by drinking milk from tuberculosis cows – this milk may even have gone through processing in a creamery; hogs contact it by following infected cattle, and by eating on ground soiled by excreta of infected poultry, as well as by eating the carcasses of animals dead of this disease; and all animals can acquire the disease by breathing tuberculosis-germ-laden air.

The symptoms of tuberculosis in animals vary greatly, depending upon the infected organ or organs. If the disease is in the lungs there may be a cough; in the intestine, chronic diarrhea; in the brain, nervous symptoms; in the udder, swellings; in the joints and testicles, enlargement; and if the disease is of very long standing there is usually evidence of unthriftiness.

A very important point is that infected animals may show no outward signs of the disease, many of them seem to be perfectly healthy. Herein is one of the dangers in that the disease may make extensive inroads in a herd or flock without its presence being suspected until a “break” occurs.

A diagnosis of tuberculosis in infected animals may be established by the inoculation method and by a reaction to a tuberculin tests. The periodic tuberculin testing of herds, with the elimination and slaughter of all those reacting to the test is the approved method which has resulted in the reduction of the disease among cattle.

Vaccination against tuberculosis of man and animals has been tried, and it appears to be a measure successful in man, but in animals this has not been practical or reliable.[4,c.27]

Ex.3. Give English equivalents:

Хронічні інфекційні захворювання; легко інфікуватись; споживання забрудненої їжі; рідка та тверда їжа; бактеріально-насичене повітря; проходити переробку; набути хворобу; дихати бактеріальним повітрям; свідчення поганого росту; підозрювати «спалах» хвороби; періодичне щеплення; виправдане тестування; зменшення захворювань.

Ex.4. Answer the questions:

- 1.What disease can be acquired by men and animals?
2. Can tuberculosis take place by breathing germ-laden air?
3. What other ways of getting infected with tuberculosis did you come to know?
4. Does milk processing prevent occurring tuberculosis?

5. Are the symptoms different, depending upon the infected organ?
6. Do animals always show outward signs of the disease?
7. How is the diagnosis established?

Ex.5. Translate into English:

1. Періодичні тестування туберкуліном призводять до зменшення захворювань серед великої рогатої худоби.
2. «Спалах» захворювання у стаді може з'явитись через те, що хворі тварини часто не мають зовнішніх ознак хвороби.
3. Метод щеплення складається із введення тварині частки туберкульозного матеріалу.
4. Знищення та забій хворих тварин виявились виправданим методом, що призвів до зменшення захворювань.
5. Після щеплення лабораторні тварини швидко одужують.
6. Хворих на туберкульоз тварин вилучають зі стада.

Ex.6. Speak on the theme "Tuberculosis Disease of Man and Animals".

Lesson 18. Foot-and-Mouth Disease.

Ex.1. Scan the words:

hoofed animals - ратичні тварини (копитні)

foot-and-mouth disease - ящур

susceptible - чутливий

mild - м'який

extent - ступінь, міра

presumably - ймовірно

invisible - невидимий

fine - тонкий, дрібний

fever - лихоманка

blister - пухирь

garbage	-	сміття, відходи
confer	-	дарувати
rapidly	-	швидко
claw	-	лапа
upper	-	верхній
rupture	-	розриватись
painful	-	болісний
slobbering	-	слиновиділення
lame	-	кульгавий
expiration	-	сплиття (часу)

Ex.2. Read and translate the text:

This is a highly contagious disease of hoofed animals such as cattle, swine, sheep, goats, deer and others. Horses do not contract the disease. Man is susceptible to mild extent.

The disease is caused by a filterable virus, a substance, presumably living organism, so small as to be invisible through the most powerful microscope, and capable passing through the finest filter. This virus is in the blood, milk, and saliva during the fever stage of the disease and in the blisters that occur during the disease.

The disease is much more severe in some outbreaks than others; in sheep and swine it is usually mild. An attack of the disease confers an immunity which rapidly disappears after three months, so that at the expiration of eighteen months the animal is as susceptible as ever.

The symptoms of the disease consist largely of blisters, containing a straw-colored fluid, appearing in the mouth, udder and teats, between the claws of the feet. The blisters soon rupture leaving a raw, reddened, painful area. Because of these, eating becomes difficult, and there is also much slobbering. Because of the blisters on the feet lameness is a prominent symptom. A slight fever is usually present at the beginning. The milk flow is reduced and loss of condition is quite marked.

In swine the blisters frequently are found only between the claws and on the under surface of the foot.

The losses from foot-and –mouth disease are heavy in those countries where the disease is permanently established. The loss is due to decreased milk and meat production as recurrent and repeated attacks leave the animals in thin condition. The death rate in an acute outbreak is not large, being not more than three per cent.

Control consists in the mandatory slaughter of all affected animals, and the sanitary disposal of the carcasses.

Ex.3. Give English equivalents:

Ратичні тварини; чутливий до хвороби; хвороба викликається вірусом; невидимий через мікроскоп; стадія лихоманки; поява пухирів; швидко зникаючий імунітет; симптом кульгавості; зменшення молока; забій вражених тварин.

Ex.4. Form pairs of synonyms:

- A. frequently, appear, painful, susceptible, visible, rapidly, heavily, increase.
- B. Invisible, painless, unsusceptible, rarely, disappear, decrease, slowly, slightly.

Ex.5. Answer the questions:

1. Is foot-and-mouth disease a contagious one?
2. What animals do not contract this disease?
3. Is man susceptible to this disease?
4. What causes foot-and-mouth disease?
5. What are the symptoms of this disease?

Ex.6. Say whether the statement is true or false:

1. After the foot-and-mouth disease animals acquire immunity for the rest of the life.
2. Man is heavily susceptible to this disease.
3. The virus, causing the disease, is not revealed in blood or saliva.
4. The symptoms of the disease consist largely of blisters, appearing in the mouth, udder and teats and between the claws of the feet.
5. The blisters do not rupture and are almost invisible.

Ex.7. Inform your groupmates about foot-and-mouth disease.

Lesson 19. Surgical Operations.

Ex.1. Scan the words:

- judgement - рішення
- skill - уміння
- dexterity - спритність

apply	- застосовувати
wound	- рана
tissue	- тканина
resist	- протистояти
destroy	- руйнувати, вбивати
resort	- вдаватися
suffering	- страждання
avoid	- уникати
wet	- зволожувати
inhale	- вдихати
fume	- випаровування
preclude	- запобігати, вилучати
injure	- пошкодження

Ex.2. Read and translate the text:

Surgery is both science and art. The success of surgical operations depends upon the judgement, skill and dexterity, as well as upon the knowledge of the operator. We must not lose sight of the fact that hygiene and sanitation are essential to the best results in veterinary as well as inhuman surgery.

Asepsis is an ideal condition which, although not always possible in animal surgery, is highly important in connection with the medical details of all surgical operations. Aseptic surgery may be said to be such as is preserved from contamination by poisonous materials, whether such poisons be applied directly to it or be generated in it by action of germs. There are three ways that a wound may be kept aseptic: by the protection it receives from the first at the hands of the surgeon, from the access of septic agents; by the power of living tissue to resist and destroy septic agents, and by application to the wound of substances which destroy them.

Local and general anaesthesia should be resorted to in painful and serious surgical operations, as operations upon all living creatures should be humanely performed and all necessary pain and suffering avoided.

Large animals have to be cast and secured before an anaesthetic is administered. For complete anaesthesia chloroform is generally employed. A sponge is wetted with the

anaesthetic and placed in a nosebag and the animal is allowed to inhale the fumes. The amount of chloroform required to produce insensibility varies much in different cases.

In the performance of any operation upon an animal of the size and strength of the bull or cow, the first consideration is to secure the animal in such a manner as to preclude the possibility of its injuring either itself or those taking any part in the operation.

The majority of operations are usually performed on the animal in a standing position.

Ex.3. Match the word combinations:

- A. surgical, septic, medical, poisonous;
- B. agents, instruments, materials, operations.

Ex.4. Complete the sentences:

1. To avoid pain and suffering
2. Aseptic surgery is preserved from
3. Large animals have to be
4. A sponge is wetted with
5. The amount of chloroform
6. Animals should be secured in such a manner as to preclude

Ex.5. Say whether the statement is true or false:

1. The success of surgical operations depends upon the skills of the operator.
2. Hygiene and sanitation in veterinary are not so essential as in human surgery.
3. A sepsis is highly important in connection with the mechanical details of all surgical operations.
4. Aseptic surgery is a surgery preserved from contamination by poisonous materials.
5. A wound may be kept aseptic by the protection from the access of septic agents.
6. Septic agents can be removed by application of substances which destroy them and by the power of living tissue to resist them.

Ex.6. Translate into English:

1. В людській і тваринній хірургії діють однакові базові принципи.
2. Хірургія це не тільки наука а і мистецтво.
3. Санітарія та гігієна є найсуттєвішими для успішного результату хірургічного втручання.

4. Анастезія є необхідною ще й для досягнення повної нерухомості та м'язової релаксації.
5. Асептична хірургія забезпечує відсутність можливого забруднення «отруйними матеріалами».
6. Кількість хлороформу для забезпечення повної нерухомості та не чуттєвості, повинна регулюватись кваліфікованим асистентом.

Ex.7. Speak on the theme "Surgical Operations".

Lesson 20. Rumenotomy.

Ex.1. Scan the words:

paunch	- живіт
removal	- усунення
ingesta	- їжа, що приймається
the said	- вище згаданий
severe	- суворий
overloaded	- перевантажений
distended	- розширений
incision	- надрізання, розріз
insert	- вставляти
content	- вміст
linen	- льняна тканина
introduce	- вводити
catgut	- кетгут
suture	- накладання шва
integument	- зовнішній покрив
stout	- сильний, товстий
gruel	- рідка їжа, кашиця.

Ex.2. Read and translate the text:

The opening of the paunch, or rumen in cattle and the removal of a part or the whole of the ingesta through the said opening is termed rumenotomy. The operation should be performed in severe cases only, where the rumen is excessively overloaded and distended. The animal is placed with its right side against a wall and firmly held in position of strong assistants. The incision is made in the most distended portion of the left side of the animal. The opening is increased in size until the operator's hand can be inserted into the rumen. Before any of the content are removed from the organ a linen cloth should be placed from the outer wound into the rumen in order to prevent any of the ingesta from getting into the abdominal cavity. After removing a portion of the contents of the rumen many practitioners introduce some medicine before closing the wound. Then the wound is carefully cleaned and the opening in the rumen is closed with uninterrupted carbolized catgut sutures. Next is closed the external wound, consisting of the intergument, muscle, and peritoneum with stout, interrupted metallic sutures. No food should be given for several hours after the operation and then gruels only. [4,c.32]

Ex.3. Give English equivalents:

Видалення частини їжі; виконувати операцію; надмірно перевантажений рубець; розширений шлунок; розташовувати тварину; робити надріз; найбільш розширена частина; збільшувати в розмірі; вставити руку; видалити вміст; льняна тканина; запобігати попаданню; черевна порожнина; вводити ліки; закривати рану; кетгутів шов; металевий шов; давати рідку їжу.

Ex.4. Answer the questions:

1. What is rumenotomy?
2. When should it be performed?
3. How is the animal placed?
4. Why should the opening be increased?
5. How is the wound closed?
6. How is the external wound closed?
7. What is it necessary to know about the diet after the operation?

Ex.5. Say whether the statement is true or false:

1. Rumenotomy is the casual operation on cattle.
2. The incision is made in the thinnest portion of the paunch.
3. Before the content is removed from rumen, a linen cloth should be placed from the outer wound into the rumen.
4. Many practitioners introduce some medicine before closing the wound.

5. After the wound is carefully cleaned it is closed with interrupted metallic sutures.
6. The external wound is also closed with interrupted metallic sutures.

Ex.6. Answer the questions:

1. Відкриття (надрізом) рубця у ВРХ та видалення прийнятої їжі через отвір називається руменотомією.
2. Операція виконується лише в складних випадках.
3. Надріз робиться з лівого боку тварини в найбільш розширеній частині рубця.
4. Оперуючий видаляє їжу рукою.
5. Слід вжити заходів, щоб запобігти попаданню шлункового вмісту у черевну порожнину.
6. Вхід у шлунок закривається обробленим карболкою кетгуттовим швом.

Ex.7. Inform the students about rumenotomy.

Unit 2

Модульна контрольна робота №1

1. Прочитайте та перекладіть текст:

MAMMALS

When man, the dominant species on earth, looks around him, he must realize at once that he shares his home, our planet, with a vast number of other living things.

Man himself is a mammal and also are many of the animals with whom he is most closely associated: the dogs and cats which often share his life, the cows and sheep and pigs upon which he feeds: the oxen, donkeys and horses which, until very recently, pulled his ploughs, carried his burdens and gave him his most effective means of transport: and the rats and mice which, even in an age when hygiene has become a fetish, still manage to appear as unwelcome guests in his home.

Quite apart from such familiar creatures, a richly varied cast of wild mammals is still spread in astonishing diversity over the face of the earth.

In the first place, all mammals belong to the important division of the animal kingdom as the Vertebrata, or "backboned animals". But reptiles, birds, amphibians and fishes are vertebrates too. All animals have lungs and breathe atmospheric air. Mammals are warm-blooded but we can say the same of birds.

A most important distinction between mammals and other vertebrates is that all mammals produce milk with which they feed their young. Another important distinction is that only mammals possess true hair.

Certainly the most important single factor which gives mammals their superiority over other animals is the development of their brain. [2, с. 10]

2. Прочитайте словосполучення та перекладіть їх українською мовою:

Dominant species, vast number, living things, man himself, closely associated, effective means, unwelcome guests, wild mammals, astonishing diversity, important division, animal kingdom, atmospheric air, true hair, protection against, single factor, brain development.

3. Заповніть пропуски у реченнях словами з тексту:

1. When ..., the dominant species on earth, looks around him, he must realize at once that his home, our planet, withof other living things.

2. Man himself is a ... and also are many of the ...with whom he is most closely associated.

3. Quite apart from such , a richly varied cast of is still spread in astonishing diversity over the face of the earth.

4. In the , all mammals belong to the important division of the animal kingdom as the... , or "backboned animals".

5. But reptiles, ... , ... and ... are vertebrates too.

6. All ... have lungs and ... atmospheric

7. Mammals are ...-... but we can say the same of

8. A most important distinction between mammals and other vertebrates is that produce ... with which they feed their... .

9. Certainly the most important which gives mammals their ... over other animals is the development of their... .

4. Поставте слова в правильному порядку, сформувавши речення:

1. man When, he must realize at once that he shares his home, the dominant species on earth, looks around him, , with a vast number of other living things, our planet,.

2. Quite face of the earth apart from such familiar creatures, cast of wild mammals is still spread in a richly varied astonishing diversity over the.

3. also are many Man himself is a of the animals mammal and closely associate with whom he is most

4. mammals produce milk A most important mammals and vertebrates is that all with which they feed other their young. distinction between.

5. superiority over Certainly the most important which the gives mammals their other animals is development of their brain. single factor.

5. Поставте питання до виділених слів:

1. When man, the dominant species on earth, looks around him, he must realize at once that he shares his home, our planet, with a vast number of other **living things**.

2. Man himself is a mammal and also are many of the animals with whom he is most closely **associated**.

3. Quite apart from **such familiar** creatures, a richly varied cast of wild mammals is still spread in astonishing diversity over the face of the earth.

4. In the first place, all mammals belong to the important division of the **animal kingdom** as the Vertebrata, or "backboned animals".

5. But reptiles, birds, amphibians and fishes are **vertebrates too**.

6. **All animals** have lungs and breathe atmospheric air.

7. **Mammals** are warm-blooded but we can say the same of birds.

Модульна контрольна робота №2

1. Прочитайте та перекладіть текст:

VARIETY OF MAMMALS

The living members of the class mammalia are today divided into three main sub-classes, according to differences in their anatomy and the manner in which they bear their young. First are the monotremes, or egg-laying mammals, of which there are only two families. Second are the marsupials, or mammals with pouches for carrying their young, which are comparatively undeveloped, even embryonic in appearance, at birth. Third, and by far the largest group, are the placentals, mammals whose young grow and develop within the mother's body, nourished by means of an organ known as the placenta, which forms a connecting link with her own blood stream. These three major divisions developed very early in mammalian history and each of them evolved thereafter quite independently of the others.

But these three main divisions are just the beginning. Living mammals are further divided into 18 smaller groups or orders. Subdivisions of each order are also made-families, genera, species according to the degree of evolutionary kinship. In addition to any popular name or names it may have, each species of animal known to zoologists is given a scientific name. [2, c. 11]

2. Прочитайте словосполучення та перекладіть їх українською мовою:

Living members, main sub-classes, according to differences in, the monotremes, egg-laying mammals, two families, the marsupials, to be comparatively undeveloped, embryonic in appearance, the largest group, the placentals, the mother's body, connecting link, blood stream, mammalian history, quite independently, evolutionary kinship, a scientific name.

3. Заповніть пропуски у реченнях словами з тексту:

1. The ... of the class ... are today divided into ... main sub-classes, according to differences in their ... and the manner in which they bear their
2. First are the ..., or egg-laying mammals, of which there are only ... families.
3. Second are the ..., or mammals with pouches for ... their young, which are comparatively ..., even embryonic in appearance, at birth.

4. Third, and by far the largest group, are the ..., mammals whose young grow and develop within the, nourished by means of an organ known as the ... , which forms a with her own ... stream.

5. These ... major divisions developed very early in mammalian ... and each of them evolved thereafter quite ... of the others.

6. But these ... main ... are just the beginning. Living ... are further divided into 18 smaller ... or orders.

7. Subdivisions of each order are also ..., genera, species according to the ... of ... kinship.

8. In addition to ... popular name or names it may have, each species of animal known to ... is given a ... name.

4. Поставте слова в правильному порядку, сформувавши речення:

1. These independently three major developed very early in of the others mammalian and each of them evolved thereafter quite divisions history.

2. The living of the class according to differences mammalia are today divided into members three main sub-classes, in their anatomy their young and the manner in which they bear.

3. In addition a scientific name to any or names, each species of animal popular name known to zoologists is given it may have.

4. are these main divisions But just the beginning three.

5. Third, far the largest group, are the placentals, whose young grow and develop within, and by nourished by means of an organ the mother's body known as the placenta, a connecting link which forms with her own blood mammals stream.

6. or egg-laying the monotremes, mammals, of two which First are there are only families.

7. of evolutionary kinship Subdivisions order are also made-families, genera, species according to the degree of each.

5. Поставте питання до виділених слів:

1. The living members of the **class mammalia** are today divided into three main sub-classes, according to differences in their anatomy and the manner in which they bear their young.

2. **First** are the monotremes, or egg-laying mammals, of which there are only two families.

3. **Second** are the marsupials, or mammals with pouches for carrying their young, which are comparatively undeveloped, even embryonic in appearance, at birth.

4. Third, and by far the largest group, are the placentals, mammals whose young grow and develop within the mother's body, **nourished by means** of an organ known as the placenta, which forms a connecting link with her own blood stream.

5. These three major **divisions developed** very early in mammalian history and each of them evolved thereafter quite independently of the others.

6. But these three main **divisions** are just the beginning.

7. Living mammals are further divided into **18** smaller groups or orders.
8. Subdivisions of each order are also made-families, genera, **species according** to the degree of evolutionary kinship.
9. In addition to any **popular name** or names it may have, each species of animal known to zoologists is given a scientific name.

Модульна контрольна робота №3

1. Прочитайте та перекладіть текст:

HOW MAMMALS EAT

Food is the fuel which makes the body machine work, and without it living things quickly lose their energy and eventually die. Plants do not “eat” in the sense that we usually understand that term, but they do synthesize organic food, using chemicals in the soil and the air as ingredients, and the rays of the sun as the source of energy. The lowest animals, on the other hand, adsorb their nourishment directly through their body coverings. Thus the amoeba, although lacking a mouth, surrounds food particles and absorbs them through the flexible membrane in which it is enclosed. In the higher animals this process of taking in food has become much more complex. To get their essential nourishing fuel and to break it down for energy, mammals, like other vertebrates, have to perform a whole series of complicated operations. First, of course, each animal has to find an actual of the kind of food suited to its particular bodily needs.

Second, the animal must actually get the food into its mouth. When a mammal swallows food, it passes into the oesophagus, a simple passage which conveys it quickly to the much wider envelope known as the stomach. Here the proteins are broken down by the action of the gastric juices, and the food goes on to the small intestine. Now reduced to a sort of mash, it continues to break down into simpler components... [2, с. 12]

2. Прочитайте словосполучення та перекладіть їх українською мовою:

Body machine, living things, to lose energy, to synthesize organic food, in the soil, the rays of the sun, the source of energy, the lowest animals, on the other hand, to adsorb directly, body coverings, food particles, the flexible membrane, the higher animals, essential nourishing fuel, to break down for energy, bodily needs, complicated operations, the gastric juices.

3. Заповніть пропуски у реченнях словами з тексту:

1. Plants do not ... in the sense that we usually understand that term, but they do ... organic food, using ... in the soil and the air as ingredients, and the rays of the sun as the ... of energy.
2. The ... animals, on the other hand, ... their nourishment directly through their ... coverings.
3. Thus the amoeba, although lacking ..., surrounds food particles and absorbs them through the ... membrane in which it is
4. In the ... animals this ... of taking in ... has become much more complex.
5. To ... their essential ... fuel and to break it down for ..., mammals, like other ..., have to perform a whole ... of complicated operations.
6. First, of course, each ... has ... an actual of the kind of food ... to its particular ... needs.
7. Second, the ... must actually ...the food into its
8. When a mammal ... food, it passes into the ..., a simple passage which ... it quickly to the much wider ... known as the stomach.
9. Here the ... are broken down by the action of the ... juices, and the ... goes on to the ... intestine.

4. Поставте слова в правильному порядку, сформувавши речення:

1. Thus, although the flexible membrane food particles lacking a mouth, surrounds the amoeba and absorbs them through in which it is enclosed.
2. of taking in food animals this process has become In the higher much more complex.
3. essential complicated operations nourishing fuel have to perform and to break it down To get their for energy, mammals, like other vertebrates, a whole series of.
4. First, of course, bodily needs each animal has particular an actual of the kind of food to find suited to its.
5. Second, get the the animal food into its mouth must actually.
6. a simple passage a mammal swallows food, it passes into the When oesophagus, which conveys it quickly to the much known as the wider envelope stomach.

7. Here the action are broken down by the small intestine of the gastric juices, and the food the proteins goes on to.

5. Поставте питання до виділених слів:

1. Food is the fuel which **makes the body** machine work, and without it living things quickly lose their energy and eventually die.

2. Plants do not “eat” in the sense that we usually **understand** that term, but they do synthesize organic food, using chemicals in the soil and the air as ingredients, and the rays of the sun as the source of energy.

3. The lowest animals, on the other hand, adsorb their nourishment directly through their **body coverings**.

4. Thus the amoeba, although lacking a mouth, **surrounds food** particles and absorbs them through the flexible membrane in which it is enclosed.

5. In the higher animals this **process** of taking in food has become much more complex.

6. To get their essential **nourishing fuel** and to break it down for energy, mammals, like other vertebrates, have to perform a whole series of complicated operations.

7. **First**, of course, each animal has to find an actual of the kind of food suited to its particular bodily needs.

Модульна контрольна робота №4

1. Прочитайте та перекладіть текст:

MAMMALS AS VECTORS OF HUMAN DISEASES.

There are many carries of infectious zoonotic diseases, both protozoan and helminthic, among mammals.

Many of these vectors belong to the order of ungulates; brucellosis and tuberculosis are transmitted through the milk of cows, goats, and sheep; goat's milk is also a vehicle of the virus of spring-summer encephalitis; horned cattle are a source of human infestation with anthrax and foot-and- mouth disease; horses transmit glanders. Beef that has not been sufficiently cooked presents a threat of infestation with the beef tapeworm, while pork can be the source of infestation with the pork tapeworm and of trichinosis.

Representatives of the order of carnivores, particularly stray dogs, are potential vectors of visceral leishmaniasis. Domestic dogs and cats are a source of rabies and toxoplasmosis in man. Dogs and wild carnivores as well as cats, are responsible for the spread of some helminthic diseases.

Many rodents are crops pests, and many are vectors and reservoirs of grave infections. Among the vectors are mice, rats, hamsters, gophers, voles, etc. [2, c. 13]

2. Прочитайте словосполучення та перекладіть їх українською мовою:

infectious zoonotic diseases, brucellosis and tuberculosis, to be transmitted, a vehicle of the virus, spring-summer encephalitis, horned cattle, a source of human infestation, the beef tapeworm, stray dogs, domestic dogs and cats, helminthic diseases.

3. Заповніть пропуски у реченнях словами з тексту:

1. Many of these ... belong to the order of ungulates; brucellosis and tuberculosis are transmitted through ... of cows, goats, and sheep; goat's milk is also a vehicle of the virus of ...; horned cattle are a source of human infestation with anthrax and foot-and- mouth disease; horses transmit glanders.

2. Beef that has not been sufficiently ... presents a threat of infestation with the ..., while pork can be ... of infestation with the pork tapeworm and of trichinosis.

3. Representatives of the order of carnivores, particularly ..., are potential vectors of visceral

4. Domestic ... are a source of rabies and toxoplasmosis in

5. Dogs and wild carnivores as well as cats, are ... for the spread of some ... diseases.

6. Many ... are crops pests, and many are ... and reservoirs of ... infections.

4. Поставте слова в правильному порядку, сформувавши речення:

1. a Many of these belong human to the order of ungulates; brucellosis and vectors tuberculosis are transmitted through the milk of cows, goats, and sheep; goat's milk is also a vehicle of spring-summer encephalitis; horned cattle are of the virus source of infestation with anthrax and foot-and- mouth disease; horses transmit glanders.
2. been that has not sufficiently presents a threat tapeworm of infestation with the beef tapeworm, while Beef pork can be the source of infestation cooked with the pork and of trichinosis.
3. particularly of the order of carnivores, stray dogs, are potential Representatives of visceral leishmaniasis vectors.
4. toxoplasmosis dogs and are a source of rabies and cats in man Domestic.
5. spread and wild carnivores helminthic diseases as well as cats, are Dogs responsible for the of some.
6. and many rodents are crops grave pests, are vectors and Many reservoirs of infections.
7. rats, the vectors voles, are mice, Among hamsters, gophers, ets.

5. Поставте питання до виділених слів:

1. Beef that has not been sufficiently cooked presents a threat of infestation with the beef tapeworm, while pork can be the source **of infestation** with the pork tapeworm and of trichinosis.
2. Representatives of the order of carnivores, particularly stray dogs, **are potential** vectors of visceral leishmaniasis.
3. **Domestic dogs** and cats are a source of rabies and toxoplasmosis in man.
4. Dogs and wild carnivores as well as cats, are responsible for the spread of **some helminthic** diseases.
5. Many rodents are crops pests, and many are vectors and reservoirs of **grave infections**.
6. **Among** the vectors are mice, rats, hamsters, gophers, voles, ets.

Модульна контрольна робота №5

1. Прочитайте та перекладіть текст:

HOW TO KEEP ANIMALS HEALTHY AND PRODUCTIVE

ANIMAL HUSBANDRY

Livestock management is an art that has been developed from years of observation and experience in breeding and caring for farm animals. The practitioner or specialist is called an animal husbandman. His duty is to keep the animals under his care in health and to nurse them when sick. He may be sure that he is doing everything within his power to maintain conditions most conducive to animal health if he will apply the fundamentals of livestock management.

BALANCED RATION

A sufficient quantity of palatable and nutritious feed is needed by animals in order to maintain their condition and production. Such a ration is one balanced as to proteins, fats, carbohydrates, minerals and vitamins. The properties of these components should be varied with the purpose for which the animals are kept. For instance, the ration of a high-producing dairy cow should include a relatively large amount of minerals and carbohydrates and should be fed according to the pounds of milk produced. Too much feed of excellent quality may be as injurious as too little.

PURE WATER

Drinking water should be supplied plentifully and be fresh and kept reasonably clean. For the dairy barn, individual drinking cups to keep water before the cows constantly are highly recommended. It is reported that they increase milk production 10 per cent. A supply of water should be available in yards and pastures. Care should be taken to guard the water from filth of all kinds as polluted water is unfit for drinking purposes. The yellow-green scum that appears in troughs during the summer is not, in itself, harmful, but, it may catch and hold dangerous microbes. By emptying the water and thoroughly scrubbing the trough with a 5 per cent solution of blue vitriol this vegetable growth may be killed.

The drinking cups become foul through decomposition of accumulated refuse and saliva, so need similar attention from time to time. Domestic water supplies are made safe by chlorination. [2, c. 15]

2. Прочитайте словосполучення та перекладіть їх українською мовою:

Livestock management, farm animals, animal husbandman, to keep the animals, to maintain conditions, a sufficient quantity, palatable and nutritious feed, the ration of a high-producing dairy cow, proteins, fats, carbohydrates, minerals, vitamins, a relatively large amount, drinking purpose, dangerous microbes.

3. Заповніть пропуски у реченнях словами з тексту:

1. The practitioner or specialist is called an
2. His duty is ... under his care in health and to ... when sick.
3. He may be sure that he is doing everything within ... to maintain conditions most conducive ... if he will apply the fundamentals of livestock management.
4. Such ... is one balanced as to proteins, fats, carbohydrates, minerals and vitamins.
5. The properties of these components should ... with the purpose for which ... are kept.
6. For instance, the ration of a high-producing dairy cow should include a relatively large amount of ... and ... and should be fed according to the pounds of ... produced.
7. Too much feed of excellent ... may be as ... as too little.

4. Поставте слова в правильному порядку, сформувавши речення:

1. individual the dairy barn, drinking For cups water before the cows constantly are highly water recommended to keep.

2. milk It is that they increase reported 10 per cent production.
3. yards and pastures A should supply of water be available in.
4. water should be taken the from filth of all kinds as Care polluted purposes water is unfit for drinking to guard.
5. the summer scum that in troughs during is not, in itself, harmful, but, it may catch and hold appears dangerous microbes The yellow-green.
6. scrubbing the water and growth thoroughly the trough with a 5 per cent By solution emptying of blue vitriol this vegetable may be killed.
7. decomposition cups become foul through of accumulated, so need similar attention refuse and saliva from time to time The drinking.
8. chlorination water supplies Domestic are made safe by.

5. Поставте питання до виділених слів:

1. **Livestock** management is an art that has been developed from years of observation and experience in breeding and caring for farm animals.
2. **The practitioner** or specialist is called an animal husbandman.
3. His duty is to keep **the animals** under his care in health and to nurse them when sick.
4. He may be sure that he is doing everything within his power **to maintain conditions** most conducive to animal health if he will apply the fundamentals of livestock management.
5. A sufficient quantity of palatable and nutritious feed is needed by animals in order to maintain **their condition** and production.
6. Such a ration is one balanced as to proteins, fats, carbohydrates, minerals and **vitamins**.
7. **The properties** of these components should be varied with the purpose for which the animals are kept.

Модульна контрольна робота №6

HOW TO KEEP ANIMALS HEALTHY AND PRODUCTIVE

DIRECT SUNLIGHT

Nature's means of controlling diseases and promoting growth of both plants and animals is through the ultraviolet rays of the sun. Accordingly barns should be built with plenty of windows to admit an abundance of sunshine. To be most effective the sunlight must be direct, as the passing of the light through window glass filters out its growth-giving and germ killing properties.

CLEAN STABLES

Stables should be designed in order to keep the animals clean. Manure should be removed daily and drawn to the field or stored at some distance from the stable. Stables should be disinfected at least twice a year. White washing the walls aids in maintaining sanitation. Attention should be paid to arrangement for making the barn work easy and to prevent crowding. Among the points which must be considered in planning the stables are the following: the site, the building materials, the walls, ceilings and floors, the lighting, and the drainage. Protection against fire by such means as fire hose and lightning rods is good insurance. [2, с. 17]

2. Прочитайте словосполучення та перекладіть їх українською мовою:

To control diseases, the ultraviolet rays, plenty of windows, to admit, germ killing properties, in order, should be removed, twice a year, to prevent crowding, the site, the building materials, the walls, ceilings and floors, the lighting, the drainage.

3. Заповніть пропуски у реченнях словами з тексту:

1. Accordingly barns ...with plenty of windows to admit an abundance of
2. To be most effective the sunlight must ..., as the passing of the light through window glass filters out its growth-giving and ... properties.
3. Manure should be removed ... and drawn to the field or stored at some ... from the
4. Stables should be ... at least ... a year.
5. White ... the walls aids in maintaining sanitation.
6. Attention should be paid to ... for making the barn ... easy and to ... crowding.
7. Among the ... which must be considered in ... the stables are the following: the site, the building materials, the walls, ceilings and floors, the lighting, and the drainage.

8. Protection against ... by such means as fire hose and ... rods is ... insurance.

4. Поставте слова в правильному порядку, сформувавши речення:

1 maintaining the walls aids in sanitation White washing.

2. crowding be paid to the barn work arrangement for making Attention should easy and to prevent.

3. the building materials the points be considered in Among planning the stables are the following: the site, , the walls, ceilings and floors, the lighting, and the drainage which must.

4. as fire hose is good fire by such means and lightning Protection against rods insurance.

5. of both plants Nature' s means diseases and promoting the ultraviolet rays growth and animals is through of the sun of controlling.

6. plenty of windows should be built with to admit an Accordingly barns abundance of sunshine.

7. glass filters most effective be direct, as the passing To be of the light through window out its growth-giving and germ killing properties the sunlight must.

5. Поставте питання до виділених слів:

1. Nature' s means of **controlling** diseases and promoting growth of both plants and animals is through the ultraviolet rays of the sun.

2. Accordingly barns should be built with plenty **of windows** to admit an abundance of sunshine.

3. To be most effective **the sunlight** must be direct, as the passing of the light through window glass filters out its growth-giving and germ killing properties.

4. Manure should be removed daily and drawn to the field or stored at some **distance from** the stable.

5. Stables should be disinfected at least **twice a year**.

6. White **washing** the walls aids in maintaining sanitation.

7. Attention should be paid to arrangement for making the barn **work easy** and to prevent crowding.

Модульна контрольна робота №7

NOW TO KEEP ANIMALS HEALTHY AND PRODUCTIVE.

GROOMING

Keeping the hair and skin in good condition by grooming and occasional washing improves both the health and appearance of the animals. Such attention tends to promote cleanliness, especially of the milk. Wiping the udder and teats just before milking with a paper towel moistened with a solution of sodium hypochlorite is good practice.

SUITABLE YARDS

Barnyards, paddocks, and open pens provide places for animals to exercise and secure fresh air. They must be well drained and fenced, and sheltered from the wind. When animals are forced to wade through mud and ashes they are much more subject to diseases and injuries of the udder and feet. By concreting low places in the barnyard the nuisance of the mud-hole and wallow may be overcome. A platform of area way of concrete is suggested as a good investment. If animals are fed in the yard, suitable racks should be provided to prevent wasting the feed and to keep it clean. [2, с. 17]

2. Прочитайте словосполучення та перекладіть їх українською мовою:

Occasional washing, appearance of the animals, especially of the milk, a good practice, before milking, to exercise, to secure, fresh air, a good investment, to prevent wasting.

3. Заповніть пропуски у реченнях словами з тексту:

1. Such attention tends to promote ..., especially of the milk.
2. Wiping the ... and ... just before milking with a paper towel moistened with a solution of sodium hypochlorite is ... practice.
3. Barnyards, paddocks, and open pens provide places for animals to ... and ... fresh
4. They must be ... drained and fenced, and sheltered from the
5. When animals are forced to wade through ... and ... they are much more subject to ... and injuries of the udder and feet.
6. By concreting ... places in the barnyard the ... of the mud-hole and wallow may be overcome.
7. A platform of ... way of concrete is suggested as a ... investment.
8. If animals are ... in the yard, suitable racks should ... to prevent wasting the feed and ... it clean.

4. Поставте слова в правильному порядку, сформувавши речення:

1. animals to exercise, paddocks, and fresh open pens Barnyards provide places for and secure air.
2. and sheltered be well drained and fenced, from the wind They must.
3. feet animals are forced to When wade through mud injuries and ashes are much more subject they to diseases and of the udder and.
4. nuisance of the low places in the overcome barnyard the mud-hole and By concreting wallow may be.
5. investment of area way of A platform is suggested as concrete a good.
6. are fed in the yard, If animals suitable should be racks provided to prevent the feed and to keep it clean wasting.
7. good practice the udder and teats Wiping just milking with a paper before towel with a solution of sodium moistened hypochlorite is.

5. Поставте питання до виділених слів:

1. Keeping the hair and skin **in good condition** by grooming and occasional washing improves both the health and appearance of the animals.
2. Such attention tends to promote **cleanliness**, especially of the milk.
3. Wiping the udder and teats just before milking with a paper towel moistened with a solution of sodium **hypochlorite** is good practice.
4. **When animals** are forced to wade through mud and ashes they are much more subject to diseases and injuries of the udder and feet.
5. By concreting low places in the barnyard **the nuisance** of the mud-hole and wallow may be overcome.
6. **A platform** of area way of concrete is suggested as a good investment.
7. If animals are fed in the yard, suitable racks should be provided to prevent **wasting the feed** and to keep it clean.

МОДУЛЬНА КОНТРОЛЬНА РОБОТА №8

A LITTLE ABOUT VIRUSES

DEVELOPMENT OF VIROLOGY

In 1892 the Russian scientist D. I. Ivanovsky published an article on the reproduction of tobacco mosaic disease with the help of an unicellular extract. Since that time virology began to develop.

In 1911 P. Rous discovered that sarcoma of the fowl could be transmitted by an agent separable from the tumour cells. It was the second large stage in the history of virology.

Genuine revolution in virology was connected with the introduction of monolayer cell culture method for cultivation of viruses. With the help of this hundreds of unknown viruses were isolated and identified.

In our days virology took a new incentive owing to impetuous development of biochemistry, biophysics and other fundamental sciences.

Modern molecular biology suggested a number of delicate and effective methods both for the isolation and investigation of viruses. They are: electron microscopy, ultracentrifugation, electrophoresis in gels, fractionation on different absorbents, isoelectrofocusing and many others.

In its turn virology gave some original methods for immunology, microbiology and some other sciences. [2, с. 60]

2. Прочитайте словосполучення та перекладіть їх українською мовою:

An article, to publish, tobacco mosaic disease, since that time, sarcoma of the fowl, cultivation of viruses, with the help of, unknown viruses, to be isolated, to be identified, investigation of viruses, electron microscopy, ultracentrifugation, electrophoresis, isoelectrofocusing, original method.

3. Заповніть пропуски у реченнях словами з тексту:

1. In ... P. Rous discovered that ... of the ... could be transmitted by an agent separable from the ... cells.
2. It was the ... large stage in the history
3. Genuine revolution in virology was connected with the introduction of ... cell culture method for ... of viruses.
4. With the help of this hundreds of ... viruses were isolated and identified.
5. In our days virology took a new incentive owing to impetuous development of ..., ... and other fundamental sciences.
6. Modern ... suggested a number of delicate and effective methods both for the isolation and ... of viruses.
7. They are: electron microscopy, ..., electrophoresis in gels, fractionation on different absorbents, isoelectrofocusing and ... others.
8. In its turn virology gave some ... methods for immunology, microbiology and some other sciences.

4. Поставте слова в правильному порядку, сформувавши речення:

1. the introduction in virology was of viruses connected with of monolayer Genuine revolution cell culture method for cultivation.
2. isolated and identified of hundreds of this unknown viruses were With the help.
3. fundamental sciences In our took a virology development new incentive owing to impetuous days of biochemistry, biophysics and other.
4. suggested molecular biology a number of delicate and both for the effective methods isolation Modern and investigation of viruses.
5. and many others electron microscopy, ultracentrifugation, electrophoresis in gels, They are: fractionation on different absorbents, isoelectrofocusing.
6. for immunology, microbiology virology gave some original methods In its turn and some other sciences.

5. Поставте питання до виділених слів:

1. **In 1892** the Russian scientist D. I. Ivanovsky published an article on the reproduction of tobacco mosaic disease with the help of an unicellular extract. Since that time virology began to develop.

2. In 1911 P. Rous discovered that sarcoma of the fowl could be transmitted by an agent separable from **the tumour cells**.
3. Genuine revolution in virology was connected with **the introduction** of monolayer cell culture method for cultivation of viruses.
4. With the help of **this hundreds** of unknown viruses were isolated and identified.
5. In our **days virology** took a new incentive owing to impetuous development of biochemistry, biophysics and other fundamental sciences.
6. Modern molecular biology suggested a number **of delicate** and effective methods both for the isolation and investigation of viruses.

МОДУЛЬНА КОНТРОЛЬНА РОБОТА № 9

A LITTLE ABOUT VIRUSES

CLASSIFICATION

There is no really scientific classification of viruses up to date. We do not know about origin and evolution of viruses well enough, but every scientific classification is based on evolutionary principles.

Classification of V. M. Zhdanov and S. Ya. Gaidamovitch is accepted in the world.

There are some cardinal properties which differ viruses from other organisms and prove that they are not substances but living units: 1) presence of only one of two nucleic acids in the compound of virus, 2) absence of autonomous metabolism and its connection with cell-master's metabolism, 3) absence of cellular structures, 4) disjunctive mode of reproduction.

This mode consists of separate synthesis of viral components in a cell with subsequent connection of them into the whole viral particle-virion.

So far as viruses differ from animals and plants, they are isolated into the independent kingdom-Vira (Viruses).

According to two types of genetic substance viruses are divided into the RNA- viruses (viruses containing ribonucleic acid) and DNA- (viruses containing desoxiribonucleic acid). There are 9 families in the DNA- subtype and 12 in the RNA- subtype. [2, c. 61]

2. Прочитайте словосполучення та перекладіть їх українською мовою:

Scientific classification, up to date, evolution of viruses, evolutionary principles, cardinal properties, living units, autonomous metabolism, viral components, independent kingdom, genetic substance.

3. Заповніть пропуски у реченнях словами з тексту:

1. We do not know about ... and evolution of viruses well enough, but every ... classification is based on ... principles.

2. Classification of V. M. Zhdanov and S. Ya. Gaidamovitch is accepted in the

3. There are some cardinal ... which differ ... from other organisms and prove that they are not substances but ... units: 1) presence of only one of ... nucleic acids in the compound of virus, 2)

absence of autonomous ... and its connection with cell-master's metabolism, 3) absence of cellular structures, 4) disjunctive mode of

4. This mode consists of separate ... of viral components in a cell with subsequent connection of them into the whole ... particle-virion.

5. So far as viruses differ from ... and plants, they are isolated into the independent ... - Vira (Viruses).

6. According to two types of ... substance viruses are divided into the RNA- viruses (viruses containing ... acid) and DNA- (viruses containing ... acid).

4. Поставте слова в правильному порядку, сформувавши речення:

1. V. M. Zhdanov world and S. Ya. Gaidamovitch is Classification of accepted in the.

2. cardinal properties which differ viruses There are some organisms and prove that they from other are not but living units substances.

3. consists of separate This mode synthesis of components in a cell with subsequent connection viral of them into the viral particle-virion whole.

4. as viruses differ So far from and plants, they are isolated animals into the kingdom- Vira (Viruses) independent.

5. two types and DNA of genetic substance According to viruses are divided into the RNA- viruses (viruses containing ribonucleic acid) - (viruses containing desoxiribonucleic acid).

6. know about origin and We do not evolution well enough, but of viruses every scientific is based on evolutionary principles classification.

5. Поставте питання до виділених слів:

1. There is no **really scientific** classification of viruses up to date.

2. We do not know about origin and evolution of viruses well enough, but **every scientific** classification is based on evolutionary principles.

3. Classification of V. M. Zhdanov and S. Ya. Gaidamovitch is accepted in **the world**.

4. There are some **cardinal properties** which differ viruses from other organisms and prove that they are not substances but living units.

5. This mode consists of separate synthesis of viral components in a cell **with subsequent** connection of them into the whole viral particle-virion.

6. So far as viruses differ from animals and **plants**, they are isolated into the independent kingdom- Vira (Viruses).

7. According to **two types** of genetic substance viruses are divided into the RNA- viruses (viruses containing ribonucleic acid) and DNA- (viruses containing desoxiribonucleic acid).

МОДУЛЬНА КОНТРОЛЬНА РОБОТА №10

A LITTLE ABOUT VIRUSES

MORPHOLOGY

There are two large groups of viruses, which differ one from another morphologically. The first group includes viruses of simple structure. They consist of only RNA or DNA and

protein subunits connected with nucleic acid. Tobacco Mosaic Virus is the most well-known representative of this group.

The viruses of the second group consist, at least, of three architectural elements, i. e. a nucleic acid located in the middle of virion, a capsule, and an envelope the latter frequently consists of some smaller elements.

It is difficult to tell about virus morphology generally, because every type of virus has too many particular features and differences.

CHEMICAL COMPOSITION

Simple viruses consist of two substances: ribo- or deoxyribonucleic acid and proteins. Viral proteins do not differ from animal or plant ones neither in architecture nor in aminoacids composition.

The viruses of the second group such as Influenza virus have in their composition nucleic acid, proteins, carbohydrates and lipids. Chemical composition of the latter two is similar to the chemical composition of carbohydrates and lipids of the cellmaster. [2, с. 61]

2. Прочитайте словосполучення та перекладіть їх українською мовою:

Simple structure, protein subunits, nucleic acid, well-known, particular features, simple viruses.

3. Заповніть пропуски у реченнях словами з тексту:

1. The ... group includes viruses of ... structure.
2. They consist of only ... or ... and protein subunits connected with nucleic acid.
3. Tobacco Mosaic Virus is the most ... representative of this group.
4. The viruses of the second group consist, at least, of ... architectural elements, i. e. a nucleic acid located in the middle of virion, a capsule, and an envelope the latter frequently consists of some ... elements.
5. It is difficult to tell about virus morphology generally, because every type of virus has too many ... and differences.
6. The viruses of the ... group such as Influenza virus have in their composition nucleic acid, proteins, ... and lipids.
7. Chemical composition of the latter two is ... to the chemical composition of carbohydrates and lipids of the cellmaster.

4. Поставте слова в правильному порядку, сформувавши речення:

1. Influenza of the second group as virus have in their The viruses such nucleic acid, proteins, carbohydrates and lipids composition.
2. of the latter carbohydrates and lipids two is similar to the chemical composition Chemical composition of of the cellmaster.
3. of this group is the most well-known Tobacco Mosaic Virus representative.

4. smaller elements of the second group The viruses consist, at least, of three architectural elements, i. e. a nucleic acid located in the middle of virion, a capsule, the latter frequently consists and an envelope of some.

5. because every is difficult to differences tell about virus morphology generally, It type of virus has too many particular features and.

6. Influenza of the second group such as The viruses virus their composition nucleic acid, proteins, carbohydrates and lipids have in.

7. composition of the Chemical latter two to the chemical is similar composition of carbohydrates and of the cellmaster lipids.

5. Поставте питання до виділених слів:

1. There are two large **groups** of viruses, which differ one from another morphologically.

2. The first group includes **viruses** of simple structure.

3. They **consist** of only RNA or DNA and protein subunits connected with nucleic acid.

4. Tobacco Mosaic Virus is the most well-known **representative** of this group.

5. The viruses of **the second** group consist, at least, of three architectural elements, i. e. a nucleic acid located in the middle of virion, a capsule, and an envelope the latter frequently consists of some smaller elements.

6. It is difficult to tell about virus morphology generally, because every type of virus has too many **particular features** and differences.

7. Simple viruses consist of **two substances**: ribo- or deoxyribonucleic acid and proteins.

8. Viral **proteins** do not differ from animal or plant ones neither in architecture nor in aminoacids composition.

Unit 3

CHECHING COMPREHENSION

1. Man himself is a ... and also are many of the animals with whom he is most closely associated.

- a) driver;
- b) mammal;
- c) doctor;
- d) rye.

2. In the first place, all mammals belong to the important division of the animal kingdom as the ...

- a) internal combustion engine;
- b) pump;
- c) vertebrata;
- d) amino acid.

3) All animals have ... and breathe atmospheric air.

- a) bread;
- b) lupine;
- c) cooling system;
- d) lungs.

4. A most important distinction between mammals and other vertebrates is that all mammals ... with which they feed their young.

- a) produce water;
- b) produce salt;
- c) produce milk;
- d) produce nitrogen.

5. A ... is particularly important to mammals as a protection against rain and cold.

- a) hairy covering;
- b) pesticides;
- c) gloves;
- d) glasses.

6. A muscular wall, or diaphragm, separates the chest cavity from the...

- a) reticulum;
- b) abdominal cavity;
- c) legs;
- d) lungs.

7) Certainly the most important single factor which gives mammals their superiority over other animals is the development of their...

- a) nose;
- b) wheat;
- c) brain;
- d) nitrogen.

8. The living members of the class mammalia are today divided into... main sub-classes, according to differences in their anatomy and the manner in which they bear their young.

- a) three;
- b) four;
- c) five;
- d) ten.

9. But these main divisions are just the beginning. Living mammals are further divided into... smaller groups or orders.

- a) nine;
- b) seven;

c) eighteen;

d) fourteen.

10. Food is the... which makes the body machine work, and without it living things quickly lose their energy and eventually die.

a) fuel;

b) oil;

c) fruit;

d) gas.

11. Plants do not «eat» in the sense that we usually understand that term, but they do... organic food, using chemicals in the soil and the air as well as the sun energy as ingredients.

a) irrigate;

b) synthesize;

c) develop;

d) envelope.

12. The lowest animals absorb their nourishment directly through their...

a) hands;

b) stomach;

c) body coverings;

d) gastric juices.

13) When a mammal swallows food, usually after chewing it, the food passes into the oesophagus, a simple passage which conveys it quickly to the much wider envelope known as the...

a) stomach;

b) blood stream;

c) amoeba;

d) simple component.

14. In the stomach the proteins are broken down by the action of the..., and the food goes on to the small intestine.

a) water;

b) nitrogen;

c) gastric juices;

d) karsil.

15. Representatives of the order of carnivores, particularly... are potential vectors of visceral leishmaniasis.

- a) trees;
- b) flowers;
- c) birds;
- d) stray dogs.

16) Many... are crops pests, and many are vectors and reservoirs of grave infections.

- a) rodents;
- b) cats;
- c) horses;
- d) rabbits;

17) The practitioner or specialist is called an ...

- a) an agronomist;
- b) a doctor;
- c) a sportsman;
- d) an animal husbandman.

18. A sufficient quantity of palatable and nutritious ... is needed by animals in order to maintain their condition and production.

- a) feed;
- b) phosphates;
- c) fertilizers;
- d) herbicides.

19) ... should be supplied plentifully and be fresh and kept reasonably clean.

- a) mineral water;
- b) lemonade;
- c) drinking water;
- d) oil.

20) Domestic water supplies are made safe by...

- a) chlorination;
- b) irrigation;
- c) decomposition;

d) elevation.

21) Nature's means of diseases and promoting growth of both plants and animals is through the ... of the sun.

a) Roentgen rays;

b) ultraviolet rays;

c) radioactive rays;

d) yellow rays.

22) Accordingly barns should be built with plenty of... to admit an abundance of sunshine.

a) windows;

b) floors;

c) pyramids;

d) ceilings.

23) ... should be removed daily and drawn to the field or stored at some distance from the stable.

a) trees;

b) manure;

c) desks;

d) rays.

24) Stables should be disinfected at least... a year.

a) ten times;

b) seven times;

c) two times;

d) twenty times.

25) Wiping the udder and teats just before... with a paper towel moistened with a solution of sodium hypochlorite is good practice.

a) keeping;

b) watering;

c) milking;

d) lightning.

26) Barnyards, paddocks, and open pens provide places for animals to exercise and secure fresh...

a) oil;

- b) air;
- c) fertilizers;
- d) sand.

27) When animals are forced to wade through mud and ashes they much more subject to... and injuries of the udder and feet.

- a) places;
- b) investigation;
- c) conversation;
- d) diseases.

28. Modern molecular biology suggested a number of delicate and effective methods both for the isolation and investigation of...

- a) diesel engine;
- b) nitrogen;
- c) viruses;
- d) tractors.

29. We do not know about origin and evolution of viruses well enough, but every scientific classification is based on...

- a) evolutionary principles;
- b) revolutionary principles;
- c) historic principles;
- d) agronomy principles.

30) There are ... large groups of viruses, which differ one from another morphologically.

- a) ten;
- b) twenty;
- c) two;
- d) fifteen.

Тематичний показчик.

А

Animal host – організм, який годує паразитів 1

Assessment – оцінка 2

Adrenal glands – надниркова залоза 2

Alopecic – алопеційний 4

Alopecia – облисіння 5

Acaricidal – що знищує кліщів 6

Adverse - шкідливий 6

Additives - добавки 8

Assigned to – призначений для 8

Atopic – незвичайний 9

Abdomen - живіт 8

Animal husbandman зоотехнік 5

Absorb – абсорбувати 3

Adhesion - прилипання (L.13)

Adult - дорослий (L.12)

Aggravate - погіршувати (L.11)

Alopecia - облисіння (L.12)

Alopecic - лисий (L.14)

Associate - пов'язувати (L.12)

В

Behavioral - поведінковий (L.14)

Blood stream – кровяне русло 2

Breed - порода (L.11)

Brittle - ламкий (L.12)

Bulla - пухир; (L.11)

С

Consensual – узгоджений 2

Cope with – справитись 2

Canine – собачий 3
Conidia - спори 4
Cutaneous - шкіряний 4
Compatible – сумісний 5
Concurrent - одночасно діючий 6
Canine scabies – собача чесотка 6
Ctenocephalides - рід вошей 7
Coatquality - якість хутра (L.12)
Complex - складний, комплексний (L.11)
Compulsive - обов'язковий (L.14)
Crust - корка (L.13)

D

Disorders – неполадки 1
Distinction - відмінність 3
Debris - відмерла шкіра 2
Deposition - відкладення,наліт; (L.11)
Desquamatedskin - шкіра,що лущиться (L.12)
Distal - віддалений, периферійний (L.14)
Disorder - розлад; (L.11)
Dominant species – домінуючі види1
Drainage – дренаж 6

E

Ectoparasite – паразити котів і собак 7
Exudation – виділення 6
Erythema – почервоніння 6
Eliminate - знищувати,ліквідувати (L.13)
Erythematosis - еритеми; (L.11)
Evaluation - оцінка (L.13)
Excessive - надмірний (L.13)
Exhibit - проявляти (L.13)
Exposure - нараження (L.14)

F

Fold – складка 3

Feline – кошачий 4

Foliaceous - листовий; (L.11)

Flexible membrane – гнучка мембрана 3

Fats – жири 5

G

Gallery – прохід 7

Gland – залоза 3

Gastric juices – травні соки 3

Genetic substances – генетична субстанція 9

H

Habitat – місце проживання 5

Hyphae – грибок 6

Highlight – висвітлити 9

Hatch – висиджувати 7

Hocks – підколінне сухожилля 7

Healing - лікування, заживлення (L.12)

Hereditary - спадковий (L.13)

Helminthic – гельмінтозний 4

Hypothyroidism - знижена функція щитовидної залози (L.12)

I

Ipsilateral – розташований з одного боку 7

Idiosyncrasy – непереносимість 9

Inflammatory – запальний 6

Inoculation – щеплення 5

Inherit - успадковувати (L.13)

Intercellular - міжклітинний; (L.11)

K

Keratinization -ороговіння (L.13)

L

Longevity – тривалість 1

Lesion - ушкодження (L.14)

Lick - лизнути (L.14)

Limb - кінцівка (L.14)

M

Maintenance - підтримка, утримування (L.12)

Marsupial - сумчаста тварина 2

Milking - процес доїння 7

N

Notorious - сумнозвісний (L.14)

O

Obesity - тучність (L.12)

Oleasa - масло, масляний (L.13)

Opaque - непрозорий, матовий (L.13)

P

Pruritic - сверблячий

Pemphigus - пухирчатий, пемфігус; (L.11)

Pili - волосяний (L.12)

Proteins – протеїни 5

Prevent- запобігати 7

Plaque - виразка (L.14)

Paddocks – вигін 7

Predisposition - схильність (L.13)

Proliferative - поширений (L.14)

Promote - сприяти; (L.11)

Pruritic - що зудить (L.14)

Pruritus - зуд (L.13)

Pyoderma - гнійний верхній шар шкіри (L.12)

R

Response - реакція; (L.11)

Remove - видаляти 6

Release - вивільняти; (L.11)

S

Scraping – зіскоблювання

Sarcoma - саркома 8

Scale - лузга (L.13)

Scraping - соскоб (L.13)

Sicca - сухість (L.13)

Sorely - жорстоко, виснажливо (L.14)

Stimulus - подразнював (L.14)

Superficial - поверхневий (L.13)

T

Treatment - лікування; (L.11)

Tapeworm - цистода 4

Thyroidgland - щитовидна залоза (L.12)

U

Ulcerated - покритий виразками (L.14)

Ultraviolet rays - ультрафіолетові промені 6

Urdder - вим'я 7

V

Vehicle of the virus - переносчик вірусів 4

Vertebrate animal - хребетна тварина 1

W

Wound - рана (L.12)

Warm - blooded - теплокровний 1

Література

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