# COURSE GUIDE FOR HYGIENE FOOD SAFETY AND QUALITY MANAGEMENT

# Academic year 2020-2021

(Date last update: 5/07/2020) (Date approved in Department Council: 6/07/2020)

MODULE	SUBJECT MATTER	YEAR	SEMESTER	CREDITS	ТҮРЕ
HYGIENE FOOD SAFETY AND QUALITY MANAGEMENT	HYGIENE FOOD SAFETY AND QUALITY MANAGEMENT	3º	1º	6,0	Core subject
TEACHING STAFF <sup>(1)</sup>			ADDRESS, TELEPHONE NUMBER, EMAIL, ETC. DIRECCIÓN COMPLETA DE CONTACTO PARA TUTORÍAS (Dirección postal, teléfono, correo electrónico, etc.)		
<ul> <li>Marina Villalon Mir</li> <li>Silvia Pastoriza de la Cueva</li> </ul>			Department of Nutrition and Food Science. Faculty of Pharmacy. Marina Villalon Mir958 242841, marinavi@ugr.es  Silvia Pastoriza de la Cueva spdelacueva@ugr.es  TIMETABLE FOR TUTORIALS OR LINK TO WEBSITE  http://www.ugr.es/~nutricion/pdf/tutorias2021.pdf		
BELONGS TO UNDERGRADUATE DEGREE PROGRAMME			AND ALSO TO OTHER UNDERGRADUATE DEGREE PROGRAMMES		
Human Nutrition and Dietetics					
PREREQUISITES OR RECOMMENDATIONS (where applicable)					
Having studied the su	bjects: Food Microbiology, Par	asitology Food	Toxicology Food	and Culinary Technolog	ïy.



Having adequate knowledge of:

Page 1

INFORMACIÓN SOBRE TITULACIONES DE LA UGR grados.ugr.es



Este documento firmado digitalmente puede verificarse en https://sede.ugr.es/verifirma/ Código seguro de verificación (CSV): 622BF25968DCF3012E18FE6CA5FD77C2

08/07/2020

Pág. 1 de 8

<sup>&</sup>lt;sup>1</sup> Consult any updates in Acceso Identificado > Aplicaciones > Ordenación Docente (∞) This course guide should be filled in according to UGR regulations on assessment of student learning: (http://secretariageneral.ugr.es/pages/normativa/fichasugr/ncg7121/!)

- Food Science
- Food Technology

#### BRIEF DESCRIPTION OF CONTENT (ACCORDING TO OFFICIAL VALIDATION REPORT)

- Hygiene, food safety and risk control systems.
- Training of professional food service.
- Implementation and monitoring of Quality Systems and General Hygiene Plans Food traceability.
- Advice on aspects of advertising, health claims and collaboration in consumer protection

#### **GENERAL AND SPECIFIC COMPETENCES**

- That students can apply their knowledge to their work or vocation professionally. Ability to gather and interpret relevant data to make judgments.
- · Potential to communicate information, ideas, problems and solutions to a specialized and unskilled audience.
- Ability to express oneself correctly in Spanish
- Troubleshooting.
- Teamwork
- Ability to apply theoretical knowledge to practice.
- Capacity for analysis and synthesis Critical thinking.
- Develop skills of research initiation.
- Motivation for quality.
- Ability to organize and plan.
- Ability to manage information.

# **OBJECTIVES (EXPRESSED AS EXPECTED LEARNING OUTCOMES)**

Knowing what the current legislation regarding food safety and be able to develop new safety standards and food make an inspection.

Can develop for a company catering food and quality control systems food (Hazard Analysis and Critical Control Points and General Hygiene Plans).HACCP

Power advise food businesses and catering aspects related to quality, food safety and the development of new products and labeling them.

# **DETAILED SYLLABUS**

**Item 1**. Introduction. Concept of hygiene and food safety. Historical evolution. Current Importance. Objectives. Framework and strategies in food security policy.

**Item 2.** Dietary alterations. Pollution-causing agents. Polluting residue concept. Routes of food contamination. Routes of direct contamination. Indirect contamination pathways. Cross contamination. Foods high risk. Frauds and food adulteration.



Page 2



Item 4. System hazard analysis and critical control points (HACCP). Objectives. Definition of hazards and critical control points. Principles and advantages of HACCP. Design and verification of the flowchart. Hazard analysis and preventive measures. Critical control points, critical limits, monitoring systems and corrective actions. Documentation and records.

Item 5. Food handling. Practice good hygiene. Unacceptable practices. Control of visits to the food handling area. Current Importance of the food handler. Handlers higher risk. Training process and control.

Item 6: Provider. Receipt of goods. Types of providers Industries Health Registry. Freight Hygiene. Hygiene in the reception of goods. Shopsystems. Irregularities in purchases. Hygiene standards

Item 7: Cleaning Management caterers. Control cleaning policy: the items to be cleaned and the cleaning. The frequency of cleaning sheets. Cleaning and disinfection programs. Preventive control measures. Management of pest control in the catering business. Pest Control Policy and hygiene standards. Preventive and control risks in kitchens and catering establishments.

Item 8: Drug Policy and recipes hygiene standards. Standards of hygiene in the preparation and handling of cooked dishes

Item 9: Cooking and reheating. Temperatures. Thermometers. Hygiene standards thermometers. Records of validation and calibration of thermometers. Keeping food hot. Cooking and reheating policy and hygiene standards.

Item 10: Storage of goods. The dry storage. Standard hygiene products dry store (commissary). Refrigeration Food Storage. Frozen Storage.

Item 11: Management and Control of garbage.

Item 12: Management and control of food packaging. Food packaging and catering application. Hygienic packaging and hygiene standards in restaurants

Item 13. Practical application of a quality assurance system. General specifications and requirements. Identification data and activity

# **PRACTICAL AGENDA**

#### 1º Laboratory Practice:

# Practical case nº 1: Fraud detection of milk adulteration

- Watered down milk.
- Skimming milk
- Determination of chloride in milk and cheese.
- Control of heat treatment and homogenization of milk.

Practical case nº2: Analytical techniques in meat and meat products



Page 3



- Determination of pH in meat
- Determination of phosphates in meat products
- Determination of starch content in meat products
- Visual inspection of the organoleptic characteristics of meat chopped

#### Practical case nº 3: Training of food handlers.

- Test dietary risk assessment in the kitchen
- Video about real situations correct handling practices in catering.
- Workshop training for food handlers in catering kitchen

Practical case nº4: Hygienic control of the steps involved in the preparation of a hot plate. Beef stew. Stages of the HACCP plan. Work templates. Control Sheets.

#### **BIBLIOGRAPHY**

# **KEY LITERATURE**

- DE LAS CUEVAS INSÚA V. APPCC aplicado a la restauración colectiva. Madrid: Ideas Propias, 2006.
- ELEY R. Intoxicaciones alimentarias de etiología microbiana. Zaragoza. Ed. Acribia, 1996.
- FEHLHABER K, JANETSCHKE P. Higiene veterinaria de los alimentos. Zaragoza.Ed.Acribia, 1995.
- FORSYTHE SJ, HAYES PR. Higiene de los alimentos, microbiología y HACCP, 2.ª ed. Zaragoza. Ed.Acribia, 2002.
  - FRAZIERWC, WESTHOFF DC. Microbiología de los alimentos. Zaragoza.Ed.Acribia, 2003.
  - ICMSF. Microorganismos de los alimentos. Características de los patógenos microbianos. Zaragoza. Ed. Acribia, 1998
  - LARRAÑAGA IJ, CARBALLO JM, RODRÍGUEZ MM, FERNÁNDEZ JA. Control e higiene de los alimentos. Madrid.Ed. McGraw-Hill, 1999.
  - MARTÍNEZ A, ASTIASARÁN I. Alimentación y salud pública, 2.ª edi. Madrid.Ed.McGraw-Hill, 2001.
  - MATAIX VERDÚ J. Nutrición y alimentación humana. I Nutrientes y alimentos. Madrid.Ed. Ergón, 2009.
  - MATAS PABLO E, VILA BRUGALLA M. Restauración colectiva. APPCC.Manual del usuario. Barcelona.Ed. Masson-Elsevier, 2006.
  - MOLLM, MOLL N. Compendio de riesgos alimentarios. Madrid: AMV, 2006.
    - ORDÓÑEZ JA, CAMBERO MI, FERNÁNDEZ L y cols. Tecnología de los alimentos. Volumen I: Componentes de los alimentos y procesos. Madrid. Ed. Síntesis, 1998.
    - PASCUAL ANDERSONMR. Enfermedades de origen alimentario: su prevención. Madrid. Ed.Díaz de Santos, 2005.
    - POLLEDO JF. Gestión de la seguridad alimentaria. Análisis de su aplicación efectiva. Madrid. Ed. AMV, 2006.
    - RODRÍGUEZ DURÁN F, ROMÁN CARIDE M, RODRÍGUEZ VERDES V, VIDAL IGLESIAS
    - J, DÍAZ RÍO JM. Guía de implantación de sistemas de autocontrol en la restauración hospitalaria. Ministerio de Sanidad y Consumo y Agencia Española de Seguridad Alimentaria. 2003.
    - Unión Europea. Libro Blanco sobre Seguridad Alimentaria. Comisión de las Comunidades Europeas. Bruselas,
       2000.
    - World Health Organization Foodborne disease outbreaks: guidelines for investigation and control World Health Organization.

READING

Firma (1): MIGUEL MARISCAL ARCAS



Page 4



Fill in text as appropriate

#### TEACHING METHODOLOGY

Students who want to benefit from this system must have a 80% attendance at lectures. In this system, students can examine two partial qualifiers, being the 2nd part final exam. They should also make autonomous work groups (called seminar), on current issues or topics that can complement the agenda for theory. The footnote to theory test shall be the average of the two grades, being essential to have at least a four on each of the parties and the rating will be a 80% of the final grade. Self-employment will be given a 10% and the other 10% of the final grade shall be the grade earned in the practice exam.

Evaluation will be based on the presentations and / or independent work exhibitions and seminars and examinations in which students must demonstrate the skills acquired.

Overcoming any of the tests will not be achieved without a uniform and balanced understanding of all the matter

ASSESSMENT (ASSESSMENT INSTRUMENTS, CRITERIA AND PERCENTAGE VALUEOF FINAL OVERALL MARK, ETC.)

DESCRIPTION OF THE EXERCISES WHICH WILL CONSTITUTE SINGLE FINAL ASSESSMENT AS ESTABLISHED IN UGR **REGULATIONS** 

# SCENARIO A (ON-CAMPUS AND REMOTE TEACHING AND LEARNING COMBINED)

# **TUTORIALS**

# **Grupo A:**

1º Semester: Tuesday de 12:00 -14:00 h; thursday de 12:00 -14:00 h; Friday 12:00 -14:00 h.

2º Semester: Tuesday y thursday de 10:30 -13:30 h

#### **Grupo C:**

http://www.ugr.es/~nutricion/pdf/tutorias2021.pdf

TIMETABLE (According to Official Academic Organization Plan)	TOOLS FOR TUTORIALS (Indicate which digital tools will be used for tutorials)
	In person, by appointment by email.



Page 5

INFORMACIÓN SOBRE TITULACIONES DE LA UGR grados.ugr.es



Firma (1): MIGUEL MARISCAL ARCAS

ë:

When it is not possible in person through Google Apps UGR Meet Forums and PRADO messaging Google Apps UGR Meet

#### MEASURES TAKEN TO ADAPT TEACHING METHODOLOGY

•

MEASURES TAKEN TO ADAPT ASSESSMENT (Instruments, criteria and percentage of final overall mark)

Ordinary assessment session

#### Theory program

Teaching the theory classes in person and / or synchronously through Google Apps UGR Meet at the official time.

- All the documentation of the theoretical part, including the transparencies used in the theory classes, are available in PRADO.
- The documentation of the theoretical part is expanded by means of consensus documents, scientific works or links to videos of interest and web pages.
- Discussion and deepening of the contents of the theoretical topics through the PRADO forums.
- Theory monitoring through, carrying out the activities proposed in each topic, carrying out compulsory and voluntary activities, participation in theoretical classes (face-to-face and virtual) and in PRADO forums.

There will be a partial exam and a final exam. In order to take the partial exam, you must attend 70% of the classes (either face-to-face or non-face-to-face)

#### Theory tools

• Face-to-face written exam and / or PRADO essay questionnaires.

Tests for solving theoretical questions. It includes 6 to 10 questions of reasoning and association of ideas rather than purely rote with timing adjusted to the content of the exam. Evaluation criteria. Partial exam is eliminated with 5. The final exam must have a grade of 5. Percentage on the final grade of the course: 60%.

• PRADO tasks: Resolution tests of the activities proposed in the topics and voluntary activities together with the preparation of an autonomous work called "SEMINAR" on topics proposed by the students and / or the teacher that are related to the specific training objectives. to fulfill in teaching this subject. Evaluation criteria. Development of the activity. Percentage of the final grade for the course: 20%.

# **Practical tools**

It will be compulsory to pass the practical knowledge, through attendance (only a recoverable fault is accepted) and the completion of a written test that supports your knowledge of the practical syllabus. Likewise, the preparation and delivery of the practice script with the results obtained is mandatory, for correction and consideration. The mark of practices supposes 20% of the final qualification obtained.

In addition, self-employment will be mandatory

Extraordinary assessment session

Same measures as in the ordinary call

Single final assessment

•



Page 6



# SCENARIO B (ONCAMPUS ACTIVITY SUSPENDED)

#### **TUTORIALS**

# **Grupo A:**

1º Semester: Tuesday de 12:00 -14:00 h; thursday de 12:00 -14:00 h; Friday 12:00 -14:00 h.

2º Semester: Tuesday et thursday de 10:30 -13:30 h

# **Grupo C:**

http://www.ugr.es/~nutricion/pdf/tutorias2021.pdf

TIMETABLE (According to Official Academic Organization Plan)	TOOLS FOR TUTORIALS (Indicate which digital tools will be used for tutorials)
	In person, by appointment by email. When it is not possible in person through Google Apps UGR Meet Forums and PRADO messaging Google Apps UGR Meet

# MEASURES TAKEN TO ADAPT TEACHING METHODOLOGY

# Theory program

- Teaching the theory classes synchronously through Google Apps UGR Meet at the official time.
- All the documentation of the theoretical part, including the transparencies used in the theory classes, are available in PRADO.
- The documentation of the theoretical part is expanded by means of consensus documents, scientific works or links to videos of interest.
- Discussion and deepening of the contents of the theoretical topics through the PRADO forums.
- Theory monitoring through, carrying out the activities proposed in each topic (1), carrying out voluntary activities (2), participation in the chat of the theoretical classes and in the PRADO forums (3).

# Internship program

Teaching practical classes synchronously through Google Apps UGR Meet at the official time

- Development of content through material designed by teachers
- Discussion and resolution of practice questions through the PRADO forums and institutional email.

Código seguro de verificación (CSV): 622BF25968DCF3012E18FE6CA5FD77C2

• Follow-up of the practices through the evaluation of the interventions in the PRADO forums and the accomplishment of tasks in each one of the practice sessions through PRADO.

.

Firma (1): MIGUEL MARISCAL ARCAS



Page 7

Pág. 7 de 8



Ordinary assessment session

#### Theory tools

• Written exam through PRADO essay questionnaires.

Tests for solving theoretical questions. It includes 6 to 10 questions of reasoning and association of ideas rather than purely rote with timing adjusted to the content of the exam. Evaluation criteria. Partial exam is eliminated with 5. The final exam must have a grade of 5. It includes 6 to 10 questions of reasoning and association of ideas rather than purely rote with timing adjusted to the content of the exam. Percentage of the final grade for the course: 60%.

PRADO tasks: Resolution tests of the activities proposed in the topics and voluntary activities together with the preparation of an autonomous work called "SEMINAR" on topics proposed by the students and / or the teacher that are related to the specific training objectives. to be fulfilled in teaching this subject. Evaluation criteria. Development of the activity. Percentage of the final grade for the course: 20%.

#### **Practical tools**

- Practical theory exam through PRADO questionnaires. It includes 4 to 5 questions of reasoning (essay mode) and association of ideas rather than purely rote with timing adjusted to the content of the exam.
- Percentage of the final grade for the course: 20%.

Extraordinary assessment session

• Same measures as in the ordinary call

Single final assessment

It will be carried out in a single academic act consisting of a theoretical-practical exam through PRADO questionnaires (essay mode). The theoretical part will represent 70% of the final grade and the practical part 30%. The students who wish to take advantage of this evaluation modality will have to request it to the Director of the Department in the first two

ADDITIONAL INFORMATION (if necessary)



Page 8

INFORMACIÓN SOBRE TITULACIONES DE LA UGR grados.ugr.es



Secretario/a de Departamento

Firma (1): MIGUEL MARISCAL ARCAS

i ago c