NOTICE

Date: 28-April-2021

It is here by informed to all the students that commencement of second, fourth and sixth semester class will be on 4th May 2021. The teachers have assigned paper as per following. Each assign teachers will take internal. The class will be follow following 1st , 3rd and 5th semester routine in which classes of 2nd , 4th and 6th semester will follow 1st , 3rd and 5th semester classes. Allotment of practical classes will be notified later. For 6th semester general students their 3 chapters of SEC-4 paper will be taught by Department of Statistics, students are requested to cooperate with that department. Students are requested to cooperate with faculties and beware about internal examinations.

HOD
Department of Zoology
Rabindra Mahavidyalaya

Semestar	Batch	Paper	Subject	Alloted Teacher
Sem II	HONS	CC-3	**Non- Chordates II**	Souren Dutta
				Piyali Pakhira
				Sudha Anjella Dhan
		CC-4	**Cell Biology**	Eureka Mondal
				Palas Kanti Manna
				Baisakhi Saha
	GEN	GE/CC-2	**COMPARATIVE ANATOMY AND DEVELOPMENTAL BIOLOGY OF VERTEBRATES**	Eureka Mondal
				Piyali Pakhira
				Souren Dutta
SEM IV	HONS	CC-8	**Comparative Anatomy of Vertebrates**	Piyali Pakhira
				Souren Dutta
		CC-9	**Animal Physiology: Life Sustaining Systems**	Baisakhi Saha
				Palas Kanti Manna
		CC-10	**Immunology**	Sudha Anjella Dhan
				Eureka Mondal
		SEC-2	**Aquarium Fish Keeping**	Sudha Anjella Dhan
				Palas Kanti Manna
				Piyali Pakhira
				Eureka Mondal
	GEN	GE/CC-4	**GENETICS AND EVOLUTIONARY BIOLOGY**	Eureka Mondal
				Souren Dutta
Sem VI	HONS	CC 13	**Developmental Biology**	Eureka Mondal
				Piyali Pakhira
		CC-14	**Evolutionary Biology**	Souren Dutta
				Sudha Anjella Dhan
		DSE-3	**Animal Behaviour**	Piyali Pakhira
				Sudha Anjella Dhan
		DSE-4	**Endocrinology**	Baisakhi saha
				Palas Kanti Manna
	GEN	DSE-2	**IMMUNOLOGY**	Sudha Anjella Dhan

				Eureka Mondal
		SEC 4	**COMMUNITY NUTRITION AND HEALTH STATISTICS**	Eureka Mondal
				Palas Kanti Manna
				Sudha Anjella Dhan
				Dr. Sadananda Chatterjee

SEM 2

Non- Chordates II **CC-3**	**Introduction** **Evolution of coelom and metamerism**	**SOUREN DUTTA**
	Annelida **1. General characteristics and Classification up to order** **2. Excretion in Annelida through nephridia.** **3. Metamerism in Annelida.**	**PYALI PAKHIRA**
	Arthropoda **1. General characteristic sand Classification up to subclass** **2. Vision in Insecta** **3. Respiration in Arthropoda (Gills in prawn and trachea in cockroach)** **4. Metamorphosis in Lepidopteran Insects.** **5. Social life in termit**	**PYALI PAKHIRA**
	Onychophora **General characteristics and Evolutionary significance**	**PYALI PAKHIRA**
	Mollusca **1. General characteristics and Classification up to classes** **2. Nervous system and torsion in Gastropoda** **3. Feeding and respiration in Pila sp**	**SUDHA ANJELLA DHAN**
	Echinodermata **1. General characteristics and Classification up to orders** **2. Water-vascular system in Asteroidea** **3. Larval forms in Echinodermata** **4. Affinities with Chordates**	**SUDHA ANJELLA DHAN**
	Hemichordata **General characteristics of phylum Hemichordata. Relationship with non-chordates and chordates**	**SOUREN DUTTA**

Cell Biology CC-4	**Overview of Cells** Basic structure of Prokaryotic and Eukaryotic cells, Viruses, Viroid, Prion and Mycoplasma	**PALAS KANTI MANNA**
	PlasmaMembrane 1. Ultra structure and composition of Plasma membrane: Fluid mosaic model 2. Transport across membrane: Active and Passive transport, Facilitated transport 3. Cell junctions: Tight junctions, Gap junctions, Desmosomes	**EUREKA MONDAL**
	Cytoplasmic organelles I 1. Structure and Functions: Endoplasmic Reticulum, Golgi Apparatus, Lysosomes 2. Protein sorting and mechanisms of vesicular transport	**EUREKA MONDAL**
	Cytoplasmic organelles II 1. Mitochondria: Structure, Semi-autonomous nature, Endosymbiotic hypothesis Mitochondrial Respiratory Chain, Chemi- osmotic hypothesis. 2. Structure and Functions of Peroxisome and Centrosome	**EUREKA MONDAL**
	Cytoskeleton 1. Type, structure and functions of cytoskeleton 2. Accessory proteins of microfilament &microtubule 3. A brief idea about molecular motors	**PALAS KANTI MANNA**
	:**Nucleus** 1. Structure of Nucleus: Nuclear envelope, nuclear pore complex, Nucleolus. 2. Chromatin: Euchromatin and Heterochromatin and packaging (nucleosome)	**PALAS KANTI MANNA**
	Cell Division 1. Cell cycle and its regulation, 2. Cancer (Concept of oncogenes and tumor suppressor genes with special 3. Mitosis and Meiosis: Basic process and their significance	**DR. BAISAKHI SAHA**
	Cell Signaling 1. Cell signalling transduction pathways; Types of signalling molecules and receptors 2. GPCR and Role of second messenger (cAMP) 3. Extracellular matrix 4. Cell interactions Apoptosis and Necrosis	**DR. BAISAKHI SAHA**

COMPARATIVE ANATOMY AND DEVELOPMENTAL BIOLOGY OF VERTEBRATES CC-2	**Integumentary System** Derivatives of integument with reference to glands and digital tips	**SOUREN DUTTA**
	Skeletal System Evolution of visceral arches	**SOUREN DUTTA**
	Digestive System Brief account of alimentary canal and digestive glands	PYALI PAKHIRA
	Respiratory System Brief account of gills, lungs, air sacs and swim bladder	PYALI PAKHIRA
	Circulatory System Evolution of heart and aortic arches	PYALI PAKHIRA
	Urinogenital System Evolution of kidney and urinogenital ducts	**SOUREN DUTTA**
	Nervous System Comparative account of brain	**SOUREN DUTTA**
	Sense Organs Classification of receptors, Brief account of auditory receptors in vertebrate	**PYALI PAKHIRA**
	Early Embryonic Development Gametogenesis: Spermatogenesis and oogenesis with reference to mammals, vitellogenesis in birds; Fertilization: external (amphibians), internal (mammals), blocks to polyspermy; Early development of frog and chick (structure of mature egg and its membranes, patterns of cleavage, fate map, up to formation of gastrula); types of morphogenetic movements; Fate of germ layers; Neurulation in frog embryo	**EUREKA MONDAL**
	Late Embryonic Development Implantation of embryo in humans, Formation of human placenta and functions, other types of placenta on the basis of histology; Metamorphic events in frog life cycle and its hormonal regulation	**EUREKA MONDAL**
	Control of Development Fundamental processes in development (brief idea) – Gene activation, determination, induction, differentiation, morphogenesis, intercellular communication, cell movements and cell death	**PYALI PAKHIRA**

SEM 4

Comparative Anatomy of Vertebrates CC-8	**Integumentary System** Structure, function and derivatives of integument in amphibian, birds and mammals.	**SOUREN DUTTA**
	Skeletal System Overview of axial and appendicular skeleton; Jaw suspension; Visceral arches.	**SOUREN DUTTA**
	Digestive System 1. Comparative anatomy of stomach. 2. Dentition in mammals	**PYALI PAKHIRA**
	Respiratory System Respiratory organs in fish, amphibian, birds and mammals	**PYALI PAKHIRA**
	Circulatory System General plan of circulation, Comparative account of heart and aortic arches	**PYALI PAKHIRA**
	Urinogenital System 1. Succession of kidney, 2. Evolution of urinogenital ducts, 3. Types of mammalian uteri	**SOUREN DUTTA**
	Nervous System 1. Comparative account of brain, 2. Cranial nerves in mammals	**SOUREN DUTTA**
	Sense Organs 1. Classification of receptors, 2. Brief account of auditory receptors invertebrate	**PYALI PAKHIRA**

Animal Physiology: Life Sustaining Systems CC-9	**Physiology of Digestion** 1. Structural organization and functions of Gastrointestinal tract and Associated glands; 2. Mechanical and chemical digestion of food, 3. Absorption of Carbohydrates, Lipids, Proteins and Nucleic Acids; 4. Digestive enzymes	**DR. BAISAKHI SAHA**
	Physiology of Respiration 1. Mechanism of Respiration, 2. Respiratory volumes and capacities, 3. Transport of Oxygen and Carbon dioxide in blood ,Dissociation curves and the factors influencing it, 4. Respiratory pigments. 5. Carbon monoxide poisoning	**DR. BAISAKHI SAHA**
	Physiology of Circulation 1. Components of Blood and their functions ;Structure and functions of haemoglobin 2. Homeostasis; Blood clotting system, Fibrinolytic system 3. Haemopoiesis; Basic steps and its regulation 4. Blood groups; ABO and Rh factor	**DR. BAISAKHI SAHA**
	Physiology of Heart 1. Structure of mammalian heart, 2. Coronary Circulation, 3. Structure and working of conducting myocardial fibres, 4. Origin and conduction of cardiac impulses 5. Cardiac Cycle and cardiac output 6. Blood pressure and its regulation	**PALAS KANTI MANNA**
	Thermoregulation&Osmoregulation 1. Physiological classification based on thermal biology. 2. Thermal biology of endotherms 3. Osmoregulation in aquatic vertebrates 4. External osmoregulatory organs invertebrates	**PALAS KANTI MANNA**
	Renal Physiology 1. Structure of Kidney and its functional unit, 2. Mechanism of urine formation, 3. Regulation of acid-base balance	**PALAS KANTI MANNA**

Immunology CC-10	**Overview of Immune System** 1. Basic concepts of health and diseases, 2. Historical perspective of Immunology, 3. Cells and organs of the Immune system	**EUREKA MONDAL**
	Innate and Adaptive Immunity 1. Anatomical barriers, 2. Inflammation, 3. Cell and molecules involved in innate immunity, Adaptive immunity (Cell mediated and humoral)	**EUREKA MONDAL**
	Antigens 1. Antigenicity and immunogenicity, Immunogens, Adjuvants and haptens, 2. Factors influencing immunogenicity, 3. Band T-Cell epitopes	**EUREKA MONDAL**
	Immunoglobulins 1. Structure and functions of different classes of immunoglobulins, 2. Antigen- antibody interactions, 3. Immunoassays (ELISA and RIA), 4. Hybridoma technology, Monoclonal antibody production	**EUREKA MONDAL**
	Major Histocompatibility Complex 1. Structure and functions of MHC molecules. 2. Structure of Tcell Receptor and its signalling, 3. Tcell development &selection	**SUDHA ANJELLA DHAN**
	Cytokines Types, properties and functions of cytokines.	**SUDHA ANJELLA DHAN**
	Complement System Components and pathways of complement activation.	**SUDHA ANJELLA DHAN**
	Hypersensitivity Gell and Coombs' classification and brief description of various types of hypersensitivities	**SUDHA ANJELLA DHAN**
	Immunology of diseases Malaria, Filariasis, Dengue and Tuberculosis	**SUDHA ANJELLA DHAN**
	Vaccines Various types of vaccines. Active & passive immunization (Artificial and natural).	**SUDHA ANJELLA DHAN**

SEC T2-Aquarium Fish Keeping	**Introduction to Aquarium Fish Keeping** **The potential scope of Aquarium Fish Industry as a Cottage Industry, Exotic and Endemic species of Aquarium Fishes**	**EUREKA MONDAL**
	Biology of Aquarium Fishes **Common characters and sexual dimorphism of Freshwater and Marine Aquarium fishes such as Guppy, Molly, Swordtail, Goldfish, Angel fish ,Bluemorph, Anemone fish and Butterfly fish**	**SUDHA ANJELLA DHAN**
	Food and feeding of Aquarium fishes **1. Use of live fish feed organisms.** **2. Preparation and composition of formulated fish feeds,** **3. Aquarium fish as larval predator**	**PYALI PAKHIRA**
	Fish Transportation **Live fish transport- Fish handling, packing and forwarding techniques.**	**PALAS KANTI MANNA**
	Maintenance of Aquarium **General Aquarium maintenance – budget for setting up an Aquarium Fish Farm as a Cottage Industry**	**SUDHA ANJELLA DHAN**

GENETICS AND EVOLUTIONARY BIOLOGY GE/CC-4	**Introduction to Genetics** Mendel's work on transmission of traits, Genetic Variation, Molecular basis of Genetic Information	**EUREKA MONDAL**
	Mendelian Genetics and its Extension Principles of Inheritance, Chromosome theory of inheritance, Incomplete dominance and co-dominance, Multiple alleles, Lethal alleles, Epistasis, Pleiotropy, Sex-linked inheritance, Extrachromosomal inheritance	**SOUREN DUTTA**
	Linkage, Crossing Over and Chromosomal Mapping Linkage and crossing over, Recombination frequency as a measure of linkage intensity, two factor and three factor crosses, Interference and coincidence, Somatic cell genetics - an alternative approach to gene mapping.	**EUREKA MONDAL**
	Mutations Chromosomal Mutations: Deletion, Duplication, Inversion, Translocation, Aneuploidy and Polyploidy; Gene mutations: Induced versus Spontaneous mutations	**EUREKA MONDAL**
	Sex Determination Chromosomal mechanisms of sex determination; dosage compensation (human)	**EUREKA MONDAL**
	History of Life Origin of Life	**EUREKA MONDAL**
	Introduction to Evolutionary Theories Lamarckism, Darwinism, Neo-Darwinism	**SOUREN DUTTA**
	Direct Evidences of Evolution Types of fossils, Incompleteness of fossil record, Dating of fossils, Phylogeny of horse	**EUREKA MONDAL**
	Processes of Evolutionary Change Organic variations; Isolating Mechanisms; Natural selection (Example: Industrial melanism); Types of natural selection (Directional, Stabilizing, Disruptive), Artificial selection	**SOUREN DUTTA**
	Species Concept Biological species concept (Advantages and Limitations); Modes of speciation (Allopatric, Sympatric)	**SOUREN DUTTA**
	Macro-evolution Macro-evolutionary principles (example: Darwin's Finches)	**SOUREN DUTTA**
	Extinction Mass extinction (Causes, Names of five major extinctions, K-T extinction in detail), Role of extinction in evolution	**EUREKA MONDAL**

SEM 6

Developmental Biology Core T13	**Introduction** Basic concepts:Phases of Development,Cell cell interaction,Differentiation and growth,Differential gene expression	**PYALI PAKHIRA**
	Early Embryonic Development 1. Gametogenesis, Spermatogenesis, Oogenesis; 2. Types of eggs, Egg membranes; 3. Fertilization(External and Internal): Changes in gametes, Blocks to polyspermy; 4. Planes and patterns of cleavage; 5. Types of Blastula; Fate maps(including Techniques); 6. Early development of frog and chick up to gastrulation; 7. Embryonic induction and organizers	**PYALI PAKHIRA**
	Late Embryonic Development 1. Fate of Germ Layers; 2. Extra-embryonic membranes in birds; 3. Implantation of embryo in humans, 4. Placenta(Structure, types and functions of placenta)	**EUREKA MONDAL**
	PostEmbryonicDevelopment 1. Development of brain and Eye in Vertebrate 2. Regeneration: Modes of regeneration, epimorphosis, morphallaxis and compensatory regeneration (with one example each)	**EUREKA MONDAL**
	Implications of Developmental Biology 1. Teratogenesis:Teratogenicagentsandtheireffectsonembryonicdevelopment; 2. In vitro fertilization, 3. Stem cell(ESC), 4. Amniocentesis	**EUREKA MONDAL**

Evolutionary Biology Core T14	Life's Beginnings: Chemogeny, RNA world, Biogeny, Origin of photosynthesis, Evolution of eukaryotes	**SUDHA ANJELLA DHAN**
	Historical review of Evolutionary concepts, Lamarckism, Darwinism and Neo Darwinism	**SOUREN DUTTA**
	1. Geological time scale, 2. Fossil records of Hominids (from Australopithecus to Homo sapiens), evolution of horse 3. Neutral theory of molecular evolution, Molecular clock	**SOUREN DUTTA**
	Sources of variations: Heritable variations and the its role in evolution	**SUDHA ANJELLA DHAN**
	1. Population genetics: Hardy-Weinberg Law (statement and derivation of equation, application of law to biallelic Population); 2. Evolutionary forces upsetting H-W equilibrium; Natural selection (concept of fitness, types of selection, selection coefficient, mode of selection heterozygous superiority). 3. Genetic Drift mechanism (founder's effect, bottleneck phenomenon) Role of Migration and Mutation in changing allele frequencies.	**SUDHA ANJELLA DHAN**
	1. Species concept, 2. Isolating mechanisms, modes of speciation 3. Adaptive radiation/macroevolution (exemplified by Galapagos finches)	**SOUREN DUTTA**
	Extinctions, Back ground and mass extinctions (causes and effects), detailed example of K–T extinction	**SUDHA ANJELLA DHAN**
	Origin and Evolution of Man, Unique Hominin characteristics contrasted with primate characteristic Molecular analysis of human origin	**SUDHA ANJELLA DHAN**
	Phylogenetic trees, Construction & interpretation of Phylogenetic tree using parsimony, Convergent& Divergent evolution.	**SOUREN DUTTA**

Animal Behaviour DSE T5	**Introduction to Animal Behaviour** 1. Origin and history of Ethology, Brief profiles of Karl Von Frish, Ivan Pavlov, Konrad Lorenz, NikoTinbergen 2. Proximate and ultimate causes of behaviour, Methods and recording of a behaviour	**SUDHA ANJELLA DHAN**
	Patterns of Behaviour 1. Stereotyped Behaviours (Orientation, Reflexes); 2. Individual Behavioural patterns; Instinct vs. Learnt Behaviour; 3. Associative learning, classical and operant conditioning, Habituation, Imprinting.	**SUDHA ANJELLA DHAN**
	Social and Sexual Behaviour 1. Social Behaviour: Concept of Society; Communication and the senses 2. Altruism; Insects' society with Honeybee as example; Foraging in honeybee and advantages of the waggle dance. 3. Sexual Behaviour: Asymmetry of sex, Sexual dimorphism, Mate choice, Intra-sexual selection (male rivalry), Inter-sexual selection (female choice), Sexual conflict in parental care.	**SUDHA ANJELLA DHAN**
	Introductionto Chronobiology 1. Historical developments in chronobiology; 2. Biological oscillation :the concept of Average, amplitude, phase and period 3. Adaptive significance of biological clocks	**PYALI PAKHIRA**
	Biological Rhythm 1. Types and characteristics of biological rhythms :Short- and Long- term rhythms; Circadian rhythms; Tidal rhythms and Lunar rhythms; 2. Concept of synchronization and masking; Photic and non-photic zeitgebers; Circannual rhythms; 3. Photoperiod and regulation of seasonal reproduction of vertebrates; 4. Role of melatonin.	**PYALI PAKHIRA**

Endocrinology DSE T7	**Introductionto Endocrinology** 1. General idea of Endocrine systems, Classification, Characteristics and Transport of Hormones, 2. Neurosecretions and Neurohormones	**PALAS KANTI MANNA**
	Epiphysis,Hypothalamo-hypophysial Axis 1. Structure of pineal gland, Secretions and their functions in biological rhythms and reproduction. 2. Structure and functions of hypothalamus and Hypothalamic nuclei, Regulation of neuroendocrine glands, Feedback mechanisms 3. Structure of pituitary gland, Hormones and their functions, Hypothalamo- hypophysial portal system, Disorders of pituitary gland.	**DR. BAISAKHI SAHA**
	Peripheral Endocrine Glands 1. Structure, Hormones, Functions and Regulation of Thyroid gland, Parathyroid, Adrenal, Pancreas, Ovary and Testis 2. Hormones in homeostasis 3. Disorders of endocrine gland	**DR. BAISAKHI SAHA**
	Regulation of Hormone Action 1. Mechanism of action of steroidal, non-steroidal hormones with receptors 2. Bioassays of hormones using RIA &ELISA 3. Estrous cycle in rat and menstrual cycle in human 4. Multifaceted role of Vasopressin &Oxytocin. 5. Hormonal regulation of parturition.	**PALAS KANTI MANNA**

IMMUNOLOGY DSE 2	**Overview of the Immune System** Introduction to basic concepts in immunology, components of immune system, principles of innate and adaptive immune system	**EUREKA MONDAL**
	Cells and Organs of the Immune System Haematopoiesis, Cells of immune system and organs (primary and secondary lymphoid organs) of the immune system.	**EUREKA MONDAL**
	Antigens Basic properties of antigens, B and T cell epitopes, haptens and adjuvants	**EUREKA MONDAL**
	Antibodies Structure, classes and function of antibodies, monoclonal antibodies, antigen antibody interactions as tools for research and diagnosis	**EUREKA MONDAL**
	Working of the immune system Structure and functions of MHC, exogenous and endogenous pathways of antigen presentation and processing, Basic properties and functions of cytokines, Complement system: Components and pathways	**SUDHA ANJELLA DHAN**
	Immune system in health and disease Gell and Coombs' classification and brief description of various types of hypersensitivities, Introduction to concepts of autoimmunity and immunodeficiency	**SUDHA ANJELLA DHAN**
	Vaccines General introduction to vaccines, Types of vaccines	**SUDHA ANJELLA DHAN**

COMMUNITY NUTRITION AND HEALTH	**Introduction** Concept of community, Types of community factors affecting health of community –environmental, social, political, cultural and economica	**PALAS KANTI MANNA**

STATISTICS SEC- IV	**Nutritional assessment of human** Clinical findings, nutritional anthropometry, biochemical tests, biophysical methods.	**PYALI PAKHIRA**
	Nutritional anthropometry Need and importance, standard for reference, techniques of measuring height, weight, head, chest and arm circumference, interpretation of these measurements. Use of growth chart.	**DR. BAISAKHI SAHA**
	Principles of Epidemiology Concept of disease (endemic, epidemic and pandemic, acute and chronic, communicable and non-communicable; zoonosis, epizootic, enzootic, vector-borne and nosocomial), rate of a disease in a population (attack rate, morbidity rate, mortality rate, incidence and prevalence), Nature of infectious and communicable diseases, factors that influence the epidemiology of a disease. Epidemiological methods: descriptive studies, analytical studies and experimental studies Epidemiology, mode of transmission, disease propagation, prevention and treatment of Tuberculosis, Malnutrition and Tuberculosis	**EUREKA MONDAL**
	Health Statistics Statistical Measures and Presentation of Data - Basic concepts of statistics – utility and limitations of Statistics Measures of central tendency-Arithmetic Mean, Weighted Arithmetic Mean, Median, Mode, Quartiles; Measures of Variation, Standard Deviation, Coefficient of Variation, Presentation of data-Bar Diagram, Histogram, Frequency Polygon, Frequency Distribution Curves, Ogives.	**Dr. Sadananda Chatterjee**
	Probability Concepts and definitions of probability, Additive and Multiplicative laws, Conditional probability. Probability distributions: Discrete – Binomial and Poisson; Continuous-Normal, Applications to hospital environment.	**Dr. Sadananda Chatterjee**
	Statistical analysis Simple Correlation and Simple Regression. Time Series – components, fitting a trend line by least squares method; Testing of Hypothesis: Null and alternative hypotheses, Chi-Square and t-tests	**Dr. Sadananda Chatterjee**
	Analysis of Variance: One-way and two-way classification	**Dr. Sadananda Chatterjee**
	Health Informatics: Concept and applications	**SUDHA ANJELLA DHAN**

RABINDRA MAHAVIDYALAYA

Department of Zoology

Total classes 80

CLASS ROUTINE FOR THE SESSION 2020-21 w.e.f. 01.09.2020

DAY	10:30-11:30			11:30-12:30			12.30-13.30			14.30-15.30			15.30-16.30			
Monday	3-ZOOH-	SND	0	1-ZOOH-	SND	0	1-ZOOH-	SND	0	3-ZOOH-	PKM	0	3-ZOOH-	PKM	0	
	5-ZOOH-	SRD	0	3-ZOOG-	EM	0	3-ZOOG-	EM	0	5-ZOOG-	SND	0	5-ZOOH-	BS	0	
				3-ZOOH-	PP	0	3-ZOOH-	PKM	0	5-ZOOH-	BS	0				
				5-ZOOH-	SRD	0	5-ZOOH-	BS	0							
																15
Tuesday	3-ZOOH-	EM	0	1-ZOOG-	SRD	0	1-ZOOH-	BS	0	3-ZOOH-	BS	0	3-ZOOH-	BS	0	
	5-ZOOH-	SRD	0	1-ZOOH-	BS	0	5-ZOOH-	PKM	0	5-ZOOH-	PKM	0	5-ZOOH-	PKM	0	
				3-ZOOH-	EM	0										
				5-ZOOH-	PP	0										
																12
Wednessday	3-ZOOG-	SRD	0	1-ZOOG-	EM	0	1-ZOOG-	EM	0	5-ZOOG-	PP	0	5-ZOOG-	PP	0	
	5-ZOOH-	EM	0	1-ZOOH-	PP	0	1-ZOOH-	PP	0	5-ZOOH-	BS	0	5-ZOOH-	BS	0	
				3-ZOOG-	SRD	0	3-ZOOH-	PKM	0							
				5-ZOOH-	SND	0	5-ZOOH-	SND	0							
																14
Thursday	3-ZOOG-	EM	0	3-ZOOH-	SRD	0	5-ZOOH-	BS	0	3-ZOOH-	PP	0	3-ZOOH-	PP	0	
	3-ZOOH-	SRD	0	5-ZOOH-	SND	0				5-ZOOG-	EM	0	5-ZOOG-	EM	0	
	5-ZOOH-	SND	0							5-ZOOH-	PKM	0	5-ZOOH-	PKM	0	
																12
Friday	3-ZOOH-	PP	0	1-ZOOH-	EM	0	1-ZOOG-	SRD	0	1-ZOOH-	PKM	0	1-ZOOH-	PKM	0	
	5-ZOOH-	SND	0	3-ZOOG-	SRD	0	1-ZOOH-	EM	0	5-ZOOH-	BS	0	3-ZOOH-	BS	0	
				3-ZOOH-	PP	0	3-ZOOH-	PP	0				5-ZOOH-	SND	0	
				5-ZOOH-	SND	0	5-ZOOH-	SND	0							
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Saturday	3-ZOOH-	SND	0	3-ZOOH-	EM	0	3-ZOOH-	BS	0	1-ZOOH-	SRD	0	1-ZOOG-	EM	0	
	5-ZOOH-	PKM	0	5-ZOOH-	SRD	0	5-ZOOG-	SRD	0	3-ZOOH-	PKM	0	1-ZOOH-	SRD	0	
							5-ZOOH-	PP	0	5-ZOOH-	PP	0				
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	13			20			18			15			14			