which matches with data already published.

*Conclusion* : The data thus obtained will be of utmost utility because of paucity of references for further researchers. Detailed histological & histochemical study will add more knowledge in discovering intricacies & relevant use of these drugs.

**Abs.PH.34**

## Study of Visual Reaction Time among Basketball Players

**Pritesh h Gandhi*, Tejas Ghuntal, H.B. Mehta, P.A. Gokhale, C.J. Shah**

*Objective* : To find out the visual reaction time in healthy controls and in basketball players. To compare visual reaction time of healthy controls and basketball players. To find out any difference and if present, its statistical significance and to analyze for observed facts.

*Method* : Sample included 100 participants aged 15-25 years, which were divided into two group. Group-1 has 50 basketball players and group 2 has 50 healthy controls. This study was done under three modules. 1st module contains detail medical history of participants. The medical history was taken to rule out any medical or surgical diseases which would affect reaction time of individual. 2nd included recording of visual reaction time in healthy controls and basketball players with the reaction time instrument which has resolution of 0.001 second. The visual reaction times were measured under two categories. (1) Simple reaction time task (2) Choice reaction time task. 3rd module consisted of the statistical analysis of the reaction time measurements. The reaction time were taken as mean & standard deviation. The level of significance between basketball players and controls were tested by the student's t-test (unpaired). The observation was taken as significant if P-value <0.05.

*Results* : Simple visual reaction time found be less than choice visual reaction time in healthy controls as well as in basketball players. Basketball players were found to have faster reaction time than controls. The quicker reaction time in basketball players as compared to controls is due to improved concentration, alertness, better muscular co-ordination and improved performance in the speed and accuracy task.

*Conclusion* : The study shows that basketball players show faster reaction time than healthy controls. As reaction times gives the information how fast a person gives a response to stimuli, it is a good indicator of performance in reactive sports like basketball.

**Abs.PT.01**

## Effect of Herbal Preparation on Radiation Induced Skin Injury

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*Objective* : To study the effect of herbal preparation on radiaton induced skin injury in patients with head and neck carcinoma.

*Method* : Effect of a herbal preparation containing *Aloe vera* gel, *Ocimum sanctum*, *Azadirachta indica* and *Curcuma longa* was evaluated in patients with Head and neck carcinoma, who have received radiotherapy/ chemoradiotherapy. Patients were divided into two groups of 15 each. Group I-control-received betamethasone cream, whereas in Group II-Treatment group-herbal gel was applied locally on the skin, 3 times daily starting from day1. Efficacy and safety of herbal preparation was evaluated by comparing treatmentt group with control group using Radiotherapy oncology group (RTOG) – criteria. For assessment of efficacy, both subjective [itching, pain, discharge] and subjective criterias were observed. Patients were be observed at day 3, 7, 15 and 30. For safety evaluation, any adverse effects observed during the study or reported by patients were noted.

*Results* : Application of herbal gel promoted quicker wound healing in patient receiving radiotherapy/chemoradiotherapy. Early wound healing was observed in treatment group i.e day 3 as compared to the control group i.e day 7. No adverse effects was observed in any patient from treatment group. RTOG-criteria showed better ulcer healing rates in treatment group as compared to control group.

*Conclusion* : Herbal preparation shows a very promising radioprotectant effect.

**Abs.PT.02**

## Effect of Latex Proteins (LP) of Calotropis Procera on Resolution of Joint Inflammation and Hyperalgesia in Arthritic Rats

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*Objective* : In view of the anti-inflammatory and anti-hyperalgesic property of LP the present study was carried out to evaluate the effect of LP on resolution of joint inflammation and dysfunction in arthritic rats.

*Method* : Arthritis was induced in rats by single injection of 0.1 ml of 0.1% of FCA into the intra-articular space of left ankle joint. The LP was administered at the doses of 5 & 25 mg/kg by i.v. route just before FCA injection and thereafter every alternate day. The Joint diameter and functional parameters like Stair climbing ability, Motility and Dorsal flexion pain were measured daily till 16 days. The effect was compared with standard anti-inflammatory drug diclofenac.

*Results* : The LP produced a dose-dependent inhibition of joint inflammation and improvement in joint functions that was comparable to diclofenac. The resolution of arthritic changes was hastened by LP with respect to the arthritic control.

*Conclusion* : The present study shows that LP not only inhibits peak inflammatory response and hyperalgesia but it also facilitates resolution of arthritis.

**Abs.PT.04**

## Antinociceptive Effect of Aqueous Extract of *Ocimum Sanctum L.* (Tulsi) in Rats

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*Objective* : To investigate antinociceptive effect of aqueous extract of leaves of Ocimum Sanctum (Tulsi) in Wister albino rats.

*Method* : The aqueous extract was obtained by Soxhlet extractor using deionised water as solvent and was kept in air tight container for further use. The antinociceptive effect was evaluated using the standard *method*s i.e. Eddy's hot plate and tail flick *method*. Twenty four albino wistar rats were divided into three groups of 8 rats each. Group I received deionised water, served as control; group II received (piroxicam 20 mg/kg) and group III received aqueous extract of Ocimum Sanctum Linn (200 mg/kg per day). All the drugs were given orally for 8 days. The tail flick latencies were recorded at the base line and then on 8th day, 1 hr after the administration of deionised water, piroxicam and aqueous extract of Ocimum Sanctum respectively. Similarly paw licking/jumping response was recorded. The latencies were expressed as mean±S.E and analysed.

*Results* : Both the aqueous extract and piroxicam group showed significant increase ($P<0.05$) in paw licking/jumping latency compared to the deionised water. The aqueous extract produced an antinociceptive effect which was comparable to piroxicam ($P>0.1$). Similarly the aqueous extract showed an increase in the tail flick latency which was significantly more than control group and comparable to piroxicam group.

*Conclusion* : The aqueous extract of Ocimum Sanctum contains pharmacologically active principles having significant antinociceptive activity through both spinal and supraspinal mechanisms.

**Abs.PT.05**

## Anticonvulsant Property of Eupatorium Birmanicum DC Leaves Alone and in Combination with Ethosuximide

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*Objective* : To evaluate the anticonvulsant activity of aqueous extract of Eupatorium birmanicum (EB) leaves alone and in combination with ethosuximide.

*Method* : Aqueous extract of dried leaves of EB was taken using Soxhlet apparatus. Healthy albino mice of either sex weighing 20-30 gm were divided into groups of 6 animals each. The groups were given vehicle, EB extract (200, 400, 800 mg/kg), subanticonvulsant dose of ethosuximide (200 mg/kg) and combination of EB extract (800 mg/kg) and ethosuximide (200 mg/kg) orally. Anticonvulsant activity was tested against chemoshock convulsion after giving pentylenetetrazole (60 mg/kg, s.c.) at the nape of the neck at a volume of 5 ml/kg. The

latency for the onset of myoclonic spasm and clonic convulsion were noted and were taken as index of protection.

*Result* : EB at 200, 400 and 800 mg/kg significantly increased the latency of onset of myoclonic spasm and clonic convulsion when compared to the control. On combining ethosuximide (200 mg/kg) and EB (800 mg/kg), there is no significant increase in the protection.

*Conclusion* : Combination of the most effective dose of EB with subanticonvulsant dose of ethosuximide offers no significant increase in the protection against PTZ model.

**Abs.PT.06**

## Effects of *Ocimum Sanctum Linn* (Tulsi) Leaf Extract on Cognition (Working Memory and Selective Attention) in Healthy Human Adults

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*Objective* : Cognition enhancing effects of tulsi has been documented in animals. However no human studies are available. This study plans to study the effect of tulsi on cognition in healthy human volunteers.

*Method* : Double blinded RCT. Ethical clearance obtained. Placebo (starch) capsules OR ethanolic extract of Tulsi leaves as capsules (300 mg/day) given to 20 healthy male volunteers for 30 days. Working memory and selective attention tested by Sternberg test and stroop task respectively at day 0 and at day 30.

*Results* : No specific side effects were reported by the participants. At the end of 30 days tulsi group showed a significant decrease in the reaction time during Sternberg memory test (P=0.04) and a significant decrease in reaction time during facilitation and neutral tasks of Stroop task (P=0.01 and P=0.01 respectively. A decreasing trend in the reaction time was observed during interference task (P=0.07). The placebo group showed no significant change in the reaction times during sternberg memory test (P=0.61) and during facilitation, neutral and interference tasks of the stroop task (P=0.06, P=0.17, P=0.61 respectively).

*Conclusion* : Tulsi leaf extract causes a significant improvement in working memory and selective attention. Future scope for being tested in a larger population and with more parameters of cognition.

**Abs.PT.07**

## Terminalia Arjuna Improves Impaired Baroreflex in Chronic Heart Failure Rats

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*Objective* : It has been established that the baroreflex is markedly decreased in chronic heart failure (CHF). Herbal drugs are increasingly being used in the treatment of cardiovascular disorders. In the present study, we investigated the effect of Terminalia arjuna bark extract on the baroreflex response in isoproterenol induced CHF in rats.

*Method* : Wistar albino rats were injected with isoproterenol (85 mg/kg, s.c.) for two consecutive days and were kept for fifteen days for induction of CHF. Terminalia arjuna bark extract (500 mg/kg) was orally administered in CHF rats for fifteen days. After completion of treatment period animals were anaesthetized and femoral artery was cannulated for recording arterial blood pressure and heart rate (HR) using Powerlab Data acquisition system. Baroreflex sensitivity was calculated as the variation in HR divided by the change in systolic arterial blood pressure (SBP). Baroreflex sensitivity (ΔHR/ ΔSBP) was tested for fall in arterial pressure by injection varying doses of sodium nitroprusside (SNP, 20-40 μg/kg) and for rise in arterial pressure by injecting varying doses of phenylephrine (PE, 20-40 μg/kg) in the right femoral vein.

*Results* : Linear regression analysis of baroreflex function showed a diminished reflex bradycardia and reflex tachycardia response in CHF rats compared to control. However Terminalia arjuna bark extract treatment significantly improved baroreflex functions in CHF rats.

*Conclusion* : Terminalia arjuna bark extract normalizes abnormal reflexes in the CHF rats.

**Abs.PT.08**

## Hypo Glycaemic and Cardio-Protective Effect of Aloe Vera in Experimental Diabetes

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*Objective* : To evaluate the hypoglycemic and anti atherogenic effects of Aloe vera leaf extract and to compare the effects with glibenclamide.

*Method* : Albino rabbits of either sex weighing around 1.5-2.5 kg were divided into four groups of six animals in each group. Group I: Normal control rabbits. Group II : Alloxan induced diabetic rabbits. Group III : Diabetic rabbits received Aloe vera leaf gel extract and Group IV : Diabetic rabbits given glibenclamide (600 μg/kg) in aqueous solution p.o. for 21 days. Glycosylated Hemoglobin HbA1c and Lipid profile parameters were determined at the end of study.

*Results* : A significant reduction in fasting blood glucose levels (28%) and HbA1c in alloxan induced diabetic rabbits (Group III). Also there was significant decrease in serum levels of triglycerides (TG), total cholesterol (TC), low density lipoprotein cholesterol (LDL-C) and a concomitant increase in high density lipoprotein cholesterol (HDL-C) in this group. There was significant decrease in 'Atherogenic index' in Aloe vera treated group. However, Aloe vera extract produced 27% protection where as Glibenclamide

produced 38% protection in diabetic rabbits.

*Conclusion* : A decrease in FBG levels, improvement in the lipid profile along with decrease in atherogenic index by administration of Aloe vera leaf extract suggests that Aloe vera could be useful as an anti diabetic agent with cardio protective activity. Further study is required to isolate the active constituents of Aloe vera and elucidate the mechanism of action for developing a potent herbal anti diabetic drug which could be used as an adjunct to oral hypoglycemics in the management of diabetes.

**Abs.PT.09**

## Hepatoprotective and Hypolipidemic Properties of Hibiscus Rosa Sinensis Flower Extracts in Albino Wistar Rats – A Preliminary Study

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*Objective* : To evaluate the hepatoprotective properties and lipid lowering properties of locally grown Hibiscus Rosa Sinensis flower extracts.

*Method* : Male Wistar rats (180-230 gm) were divided into seven groups of six animals each (n=6). The first group served as the control. Three groups were given HRS flower extracts orally, doses of 80 mg/kg, 160 mg/kg and 240 mg/kg body weight once a day for 5 days (acute) and another three groups were given same doses of HRS flower extracts for 30 days (chronic). At the end of treatment duration all animals were sacrificed by cervical dislocation. Laparotomy was performed. Blood was collected by cardiac puncture and allowed to clot. Serum was separated for the estimation of SGOT, SGPT, LDH, ALP, total Protein, Albumin, Total cholesterol, TG, HDL, LDL, VLDL levels. Data was analyzed by One way ANOVA followed by Bonferoni test.

*Results* : There was a decrease in serum cholesterol ($P<0.002$) and triglyceride levels and increase in high density lipoproteins level ($P<0.002$) on treatment of HRS extract. HRS flower extract resulted in a decline in the hepatic marker enzymes levels.

*Conclusion* : The extract of Hibiscus Rosa Sinensis has hypocholesterolemic potential with hepatoprotective action.

**Abs.PT.10**

## In-vitro Antioxidant Activity of Ethanolic Extract of Fruits of Solanum Nigrum

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*Objective* : This study was conducted to investigate the antioxidant effect of the ethanolic extract of the fruits of *solanum nigrum.*

*Method* : Antioxidant activity was evaluated by different assays, including reducing power, 2, 2-diphenyl-1-picrylhydrazyl (DPPH),

superoxide anion, nitric oxide and hydrogen peroxide (H2O2) scavenging *method*. Total phenolic and total flavonoid contents of the extract were also determined. The antioxidant activities were compared to standard antioxidant ascorbic acid.

*Results* : The extract showed potent activities on reducing power, DPPH, Superoxide anion, hydroxyl radical, nitric oxide and hydrogen peroxide. The extract exhibited scavenging activities in all radicals tested due to its high phenol and flavonoids contents.

*Conclusion* : The findings of the present study suggested that this plant could be a potential natural source of antioxidants and could have greater importance as therapeutic agent in preventing or slowing oxidative stress related degenerative diseases.

**Abs.PT.11**

## Effect of Terminalia Arjuna Bark Extract on Cardiovascular Parameters of Rabbits

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*Objective* : To evaluate effect of terminalia arjuna bark extract (alcoholic) on BP, ECG and lipid profile in normal and after 24 hours of isoproterenol administration in rabbits.

*Method* : In urethane anesthetized rabbits (1-1.5 kg), BP was recorded by polyrite with the help of stethoms stain gauge pressure transducer connected to femoral artery. BP, ECG and lipid profile were recorded in normal (initial, control) and after 24 hours of isoproterenol administration. Effect of T. arjuna extract (200 mg/kg, PO) was recorded on these parameters in normal and isoproterenol treated rabbits (acute and chronic).

*Results* : Isoproterenol administration resulted in increased BP and hypercholesterolemic effect in rabbits. T. arjuna extract produced hypotension and hypolipidemic effects in isoproterenol treated rabbits. Administration of T. arjuna bark extract reversed the ECG changes induced by isoproterenol in rabbits.

*Conclusion* : T. arjuna bark extract reverses isoproterenol induced cardiac abnormalities in rabbits.

**Abs.PT.12**

## Hyperactivation of the Hypothalamo-Pituitary-Adrenocortical Axis in Experimental Diabetes Mellitus; Effect of Tinospora Cordifolia (Wild.) and Insulin Therapy

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*Objective* : Evidence is available now, to reveal that the hyperactivation of Hypothalamo-Pituitary-Adrenal (HPA) axis in diabetic patients and animals is characterized by elevated circulating cortisol or corticosterone levels. Characteristic changes in food and

water intake behaviour are also seen in diabetes mellitus. In present study, we investigated the extent to which changes in corticosterone level and food and water intake behaviour occur in diabetes and explored the effect of Tinospora cordifolia extracts (both aqueous and alcoholic) in different dosages (200 and 400 mg/kg b.w) on body weight, food and water intake behavior and corticosterone levels in streptozotocin diabetic rats.

*Method* : Female albino rats of inbred Wistar strain (body wt. 180-210 g) were used in this study. Experimental diabetes was induced by injecting freshly prepared streptozotocin at the dose of 55 mg/kg b.w. intravenously in 0.1 M citrate buffer of pH 4.5. The drug was administered orally for 10 days and 30 days in different groups containing six rats in each group. Body weight, food intake and water intake was monitored in each animal. Fasting blood glucose and plasma corticosterone levels were estimated. Efficacy of this drug was compared with the Lante Zinc Insulin (6 units/kg b.w. daily, i.p.) treated diabetic rats.

*Results* : There was a striking reduction in body weight, but elevated fasting blood glucose, corticosterone levels observed in untreated diabetic rats during the study period. Elevated water and food intake behaviour was also prominent in these animals. Treatment with Tinospora cordifolia as well as insulin therapy could ameliorate all these altered parameters towards normal.

*Conclusion* : This study clearly showed that the Tinospora cordifolia has got a significant ($P<0.05$) effect in ameliorating all these parameters towards normal in diabetic animals and has got an efficacy, which is equally good compared to standard drug insulin.

**Abs.PT.13**

## Sub-Fractions of Methanol Extract of Dried Latex of Calotropis Procera F8 and F9 Attenuate Acute Inflammation by Inhibiting Various Inflammatory Mediators and Attenuating Oxidative Stress

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*Objective* : To evaluate the anti-inflammatory efficacy of sub-fractions of methanol extract of dried latex of *Calotropis procera* and to study its effect on inflammatory mediators myeloperoxidase (MPO), nitric oxide (NO) and parameters of oxidative stress namely glutathione (GSH), malondialdehyde (TBARS) in carrageenan induced paw edema model.

*Method* : Methanol extract of dried latex of *Calotropis procera* was subjected to column chromatography using solvents of increasing polarity and 11 fractions were obtained. These fractions were screened for their anti-inflammatory activity in rat paw edema model where inflammation was induced by sub-plantar injection of carrageenan. These fractions were administered orally 1 hr before inducing inflammation and the paw volume was measured at 0 and 3 h. The inhibitory effect was compared with that of diclofenac and rofecoxib. The animals were sacrificed

and the paw was dissected out to measure the levels of nitric oxide(NO), myeloperoxidase (MPO), parameters of oxidative stress namely gluatathione (GSH) and malondialdehyde (TBARS) and histological analysis.

*Results* : Of all the fractions screened, fraction 8 (F8) and fraction 9 (F9) showed a dose-dependent inhibition of edema and normalized the levels of NO, MPO, GSH and TBARS at 50 and 150 mg/kg doses and their effect was comparable to diclofenac and rofecoxib. Their anti-inflammatory effect was also substantiated by histological analysis of the paw tissue.

*Conclusion* : F8 and F9 possess potent anti-inflammatory activity and have strong therapeutic potential in inflammatory conditions.

Abs.PT.14

## Determining the Efficacy of Curcumin as an Add-On Therapy in Bronchial Asthma Patients

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*Objective* : To evaluate the efficacy and safety of Curcumin capsules as an 'add-on' therapy in bronchial asthma patients.

*Method* : An open, randomized study assessing the efficacy of orally administered Curcumin capsules in addition to the standard therapy for asthma was done at Subharti Medical College, Meerut (UP). 77 bronchial asthma patients, aging 18 to 55 yr, were enrolled in the study. All the selected patients were randomized into either of the two groups: Group A – Receiving standard therapy for asthma for 30 days; Group B – Receiving standard therapy for asthma + Cap Curcumin 500 mg BD daily for 30 days. All patients were followed up every tenth day for a period of one month. Various laboratory investigations including hematological & biochemical test, urine analysis, chest X-ray and pulmonary function test were performed. All adverse events either reported or observed by patients were recorded. The predefined primary endpoints were rapid symptomatic control, clinical, biochemical and hematological improvement and change in the pre-bronchodilator FEV1 during the treatment. Statistical analysis was done.

*Results* : On analyzing the data, it was observed that reduction in severity of asthma symptoms were similar in both the groups. A significant improvement in FEV1 values was seen in Group B (Curcumin) patients as compared to Group A patients ($P<0.05$) at the end of the study. Additionally, there was a significant improvement in hematological parameters (total leukocyte count, lymphocytes, neutrophils, eosinophils, ESR) in Group B (Curcumin) patients as compare to Group A patients ($P<0.05$). There were no clinically significant reported or observed adverse events.

*Conclusion* : Curcumin, as an add-on therapy, is clinically effective and safe in patients suffering from bronchial asthma.

**Abs.PT.15**

## Effect of Tulsi (*Ocimum Sanctum*) on Sperm Count and Reproductive Hormones in Male Albino Rabbits

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*Objective* : The present study was undertaken to analyze the effect of Ocimum Sanctum (OS) on sperm count and reproductive hormones in male albino rabbits.

*Method*s : Rabbits were divided into 2 groups of ten each. Group I (Control) : Standard chow diet. Group II (Test) : maintained on same diet which the control group rabbits received along with supplementation of 2 gm fresh leaves of Ocimum sanctum orally/day for 30 days. After 30 days sperm count was done in rabbits of both groups. The blood sample assessment of hormone levels (testosterone, FSH and LH)was done from both the groups.

*Result* : In the present study, decrease in sperm count in rabbits fed on OS leaves was observed as compared to control animals. A marked increase in serum testosterone level was observed in OS treated rabbits as compared to control. However LH level was significantly reduced in this group. FSH levels in test group were also decreased as compared to control group.

*Conclusion* : It can be thus be concluded that antispermatogenic effect of OS is brought about by modulation of levels of reproductive hormones. Since this is a preliminary study, further studies are required to establish the role of OS as an effective herbal male contraceptive.

**Abs.PT.16**

## Effect of Catharanthus Roseus Leaf Extract on Water and Electrolytes Excretion in Rats

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*Objective* : To study the effect of Catharanthus roseus aqueous and alcoholic extracts on water and electrolytes excretion in rats.

*Method* : Albino rats of either sex (150-180 g) were fasted overnight but allowed tap water ad. Libitum. On the next morning warm tap water (5 ml/100 g) was given to all rats. Animals were divided into 2 groups of 10 each. Group I-Control, Group II-received aqueous extract (100 mg/kg, po). Rats were placed individually in metabolic cages and % excretion of water load was calculated in control and drug treated rats. Similarly animals were divided in to 2 groups for alcoholic extract. Cross over tests were carried out after 48 h. electrolytes ($Na^+$, $K^+$) were estimated in urine samples by flame photometer.

*Results* : In water loaded unanesthetized rats, administration of C. roseus aqueous & alcoholic extracts produced antidiuretic effect. Electrolytes excretion was also reduced significantly after both aqueous & alcoholic extract administration.

*Conclusion* : C. roseus aqueous and alcoholic

leaf extracts reduce water and electrolytes excretion in rats.

**Abs.PT.17**

## Antiepileptic Effect of Marsilea quadrifolia in PTZ induced Rat Model : An EEG Study

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*Objective* : Pentylenetetrazole (PTZ) induced seizure model has been used commonly for screening antiepileptic drugs. Marsilea quadrifolia belongs to family Marsileaceae used in epileptic disorders in traditional Indian medicine. Antiepileptic effect of methanolic extract of M. quadrifolia (MEMQ) was tested in PTZ induced rat model.

*Method* : Steriotaxicaly nicrome electrodes were implanted into the brain of anesthetized male Wistar rats motor cortex (AP : –1.5, L : +0.2, H : 1.5). One weak post-surgery, rats (n=20) weighing 250 to 300 g were randomly divided into four groups (n=5), Group I – Control (Normal saline), Group II – Standard (Sodium Valproate), Group III – MEMQ 400 mg/kg and Group IV – MEMQ 600 mg/kg; were administered orally 30mins prior to PTZ (60 mg/kg) challenge. Recordings were done using Biopac (MP35) for 15 minutes before and after the PTZ injection. Onset of first clonus and mortality was noted within 48 hrs.

*Results* : Onset of first clonus in Group II, III and IV were significantly prolonged compared to Group I; were respectively 360.33±136.2, 94.33±41.58, 216.67±64.58 and 58±12.13. In Group-I, the mortality was 100%, but in other groups the interventions were protective. At baseline cortical EEG was 3.5±0.5 μV and 15±2Hz. EEG amplitude and frequency after PTZ in all the groups were respectively 70±20.6, 15.7±7.2, 20.19±4.5, 19.23±2.85 μV and 6±1, 14±1.3, 12±1, 14±2 Hz.

*Conclusion* : MEMQ is having antiepileptic effect. Though it could not give 100% protection against the seizure but it is able to prevent the mortality. The active component and its action on GABAA receptors in PTZ induced epilepsy is yet to be established.

**Abs.PT.18**

## Effect of Aloe Vera (*Aloe Barbadensis*) Gel Extract on Re-Polarization State of Myocardium in Albino Rat

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*Objective* : Aloe vera is a well known medicinal plant contents with over 75 different ingredients, anthraquinones, saponins, and sterols. Recent studies showed that it is a

potent hypolipedimic, hypoglycemic and antioxidant. In present study we investigated the dose dependent effect of aloe vera gel on repolarization state of myocardium, heart rate, QRS complex and QT interval using electrocardiograph in albino rats.

*Method* : A total of 24 male albino rats were divided into four groups, one control and three experimental. An aqueous solution of Aloe barbadensis was prepared by taking fresh leaf of aloe plant. Animals of all the groups were anesthetized and were treated (i.p.) with aloe vera gel extract in doses of 100, 200 and 300 mg/kg body weight in experimental groups I, II and III, respectively. Electrocardiograms were recorded at 0 (basal), 15 and 30 min after injection of aloe vera/ saline.

*Results* : Aloe vera in doses of 200 mg increases QTc from 73.10±3.25 (mv) to 75.04±1.93 (mv) and in 300 mg, QTc increased from 72.10±1.85 to 76.10±1.56 which is statistically significant ($P<0.05$).

*Conclusion* : Higher doses of aloe vera cause prolongation of QTc interval in albino rat. Therefore administration of aloe vera in higher doses may be cardio toxic.