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M.Pharm [Pharmaceutics] Students under taking Project work/Field work / Internship for the Academic Year 2021-2022.

S.NO	DESCRIPTION
1	Certificate of Head of Institution
2	List of **M.Pharm[Pharmaceutics]** Students under taking Project work/Field work / Internship-HOI
3	List of **M.Pharm[Pharmaceutics]** Students under taking Project work/Field work / Internship.

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The Students Participated in More than one activity has been counted as **ONE** only.

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S. No	Reg.No	Name of the Student	Year	Project Work-Topic	Field work	Internship
1.	261810809	NISAR AHMED C.P	II	FORMULATION AND EVALUATION OF BILAYERED TABLET OF DIVALPROEX SODIUM.	-	-
2.	261910802	S.ELANGOVAN	II	FORMULATION AND EVALUATION OF IMMEDIATE DRUGRELEASE CONTAINING CHENODEOXYCHOLIC ACID HEPATOPROTECTIVE DRUG .	-	-
3.	261910806	R.KASTHURIDEVI	II	FORMULATION ,DESIGN,DEV	-	-

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				ELOPMENT AND EVALUATIO N OF LORNOXICA M DISPERSIBLE TABLETS.		
4.	261910807	B.LOGESWARAN	II	FORMULATI ON AND EVALUATIO N OF LEVOTHYRO XINE SODIUM IMMEDIATE RELEASE TABLET.	-	-
5.	261910808	G.NANDHA KUMAR	II	FORMULATI ON AND EVALUATIO N OF CURCUMIN PHYTOSOME S.	-	-
6.	261910809	P.NANDHITHA	II	FORMULATI ON AND INVITRO EVALUATIO N OF MUCOADHES IVE BUCCAL TABLETS OFLOSARTA	-	-

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				N POTASSIUM USING SYNTHETIC AND NATURAL POLYMERS.		
7.	261910810	S.SHIHABUDEEN	II	FORMULATION AND EVALUATION OF SUSTAINED RELEASE MATRIX TABLETS OF A SELECTIVE ANTIHYPERTENSIVE DRUG.	-	-
8.	261910811	S.SUNDARAMOORTHY	II	FORMULATION AND EVALUATION OF NEVIRAPINE EXTENDED RELEASE TABLETS.	-	-
9.	261910812	A.SURESHKUMAR	II	FORMULATION AND INVITRO EVALUATION OF PRAZIQUANTEL CHEWABLE TABLET FOR	-	-

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				BETTER HELMENTHIASIS TREATMENT.		
10.	261910813	R.VEERAJOTHI	II	FORMULATION AND EVALUATION OF SUSTAINED RELEASE TABLETS OF GEMIFLOXACIN USING NATURAL POLYMERS.	-	-
11.	261910814	R.VIBIN BOSE	II	DESIGN AND CHARECTERIZATION OF NANOEMULSION FOR SOLUBILITY ENHANCEMENT OF PRAMIPEXOLE.	-	
12.	261910815	G.VINOTHRAJ	II	DEVELOPMENT AND EVALUATION OF CLOPIDOGREL BISULPHATE BUCCAL PATCH FOR TREATMENT OF	-	-

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				THROMBOSIS .		
13.	261910804	KARTHICK.V	II	FORMULATION AND EVALUATION OF CEFUROXIME AXETIL ORAL SUSPENSION.	-	-

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FORMULATION AND EVALUATION OF BI-LAYERED TABLET OF DIVALPROEX SODIUM

A Dissertation submitted to

THE TAMILNADU Dr. M.G.R. MEDICAL UNIVERSITY,

CHENNAI--600032

in partial fulfillment of the requirements for the degree of

MASTER OF PHARMACY
IN
PHARMACEUTICS

Submitted By

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CONCLUSION

In the present work bi-layered tablet of Divalproex sodium were prepared by wet granulation method, using superdisintegrants such as sodium starch glycolate and croscarmellose for immediate release layer and polymer like HPMC K4M and HPMC K100M for sustained release layer.

Best formulations of each layer were selected for bi-layered tablet and bi-layered tablet were prepared. Bi-layered tablet of Divalproex sodium were subjected to hardness, weight variation, friability, drug content uniformity, *in vitro* drug release and drug polymer interaction.

The above studies lids to following conclusions:

- FTIR and DSC studies indicated that the drug is compatible with all the excipients.
- Both immediate and sustained release layer were prepared by wet granulation method andpunched separately. The prepared tablets of both layers were evaluated for post compression parameters.
- According to the *in vitro* dissolution profile date one formulation of each layer were selected for bi-layered tablet. IF6 from immediate release formulations as they showed

  98.62 % drug release within 20 minute. SF8 from sustained release formulation as they showed 94.29 % drug release within 18 hours.
- The bilayer tablets were prepared using the selected immediate and sustained release layer. The prepared tablets were found to be good and free from chipping and capping.
- The hardness of the prepared tablets was found to be in the range of 5.85 to 7.05 kg /cm^2

- The low values of the standard deviation of average weight of the prepared tablets indicate weight uniformity within the batches prepared.
- The friability of the prepared tablet was found to be less than 1%.
- The percentage drug content was uniform in all the formulations of prepared bi-layeredtablets.
- *In vitro* drug release pattern of the bi-layered tablets were same as individual layertablets.
- The stability study showed that no significant changes in tablets after 3 months study.

Based on the observations, it can be concluded that the formulated bi-layered tablets of Divalproex sodium using superdisintegrants, release retardant polymers and different excipients was capable of exhibiting all the properties of bi-layered tablet. They are thus reducing the dose intake, minimize dose related adverse effect, cost and ultimately improve the patient compliance and drug efficiency.

SUMMARY

The present work is a formulation and evaluation of bi-layer tablet of Divalproex sodium, which is used in treatment of epilepsy, bipolar disorders and used in prophylaxis of migraine, was carried out.

The formulation known as bi-layered tablet was developed with the aim to deliver the Divalproex sodium as immediate release and extent the drug release for 18 hours for the better and extended clinical effect. Compatibility studies by FTIR indicate that no significant interactions between excipients. Both layer were prepared by wet granulation and punched separately. Six formulations (IF1-IF6) of immediate release tablets were prepared by using

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7. SUMMARY AND CONCLUSION

Aim of the current research was to develop an Immediate Release Tablets, of robust quality equivalent to USP standard Reference Listed Drug (RLD), for the selected hepato-protective drug.

The primary physico-chemical characterization (Physical description, Partition coefficient, pH, Spectral analysis) for the API were studied and confirmed. Further evaluation of RLD were performed for optimizing the standard reference values to be used while developing andoptimizing various study formulations.

The pre-formulation studies LOD, Solubility study, DEC, Flow and consolidation properties was performed for the API and excipients. The LOD was found to be in line with the standard LOD range of NMT 2%.The solubility studies indicated that the drug satisfactorily soluble in 0.08% polysorbate 80 (pH 6.8). DEC study performed for the physical mixture of drug and excipients showed that the API and excipients do not have any physical interactions amongst them.

Retention time was observed to be at 22 min at 195 nm detected by UV Visible detector. The developed method was validated and found to be linear, accurate and reproducible.

The flow and consolidation properties studied for the drug and excipient blend indicates that the blend has a Good flow property with an angle of repose value 32.15.Compressibilityindex (14%) and Hausner's Ratio (1.16) was within the range of Good flow property, thus the blend was selected for tablet preparation by Direct compression method.

After the initial pre-formulation studies, optimization process for the formulation variables were carried out by varying parameters involved in the formulation development.

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The drug-excipient concentration or ratio variation (Formulations F1 – F5), which has impact on dissolution and disintegration was studied for the formulation trials. Among the various formulations optimized, the F1 formulation with 8 mg Sodium starch glycolate and 1.6 mg Magnesium stearate exhibited the desired drug release profile.

The disintegration study evaluation done using Paddle method for the formulations F1 – F5 was performed. Disintegration time for the F1 formulation (with 8 mg of SSG and 1.6 mg MS) was observed at 42 to 60 Sec which is much closer to the values of RLD (43 – 60 Sec).

Dissolution profile for the study formulations F1-F5 performed exhibits release percentage falling within the limits at 45 min. based on the similarity factor for the formulations F1-F5 incomparison to RLD it was observed that formulations F2, F3, F4 & F5 exhibited a comparable amount of percentage release difference from the RLD value, whereas F1 formulation showed a much closer release profile value.
Therefore, F1 was considered to be better formulation with 81% of similarity factor compared to RLD product. F5 was considered to optimized formulation 68% of similarity factor compared to RLD product.

Thus, the optimized F1 formulation was further subjected to evaluate the content uniformity, assay and water content, to ascertain the stability of the formulation on storage, which were within the standard reference limit.

Short-term Stability studies performed for the optimized F1 Formulation for a time period of one month at room temperature and 40°C/75%RH. The results were found to be satisfactory and within the specification limit for both the temperature conditions.

Thus, on the basis of our research findings it could be concluded that the proposed design for the development of immediate release tablets of fluffy, low soluble molecule was extensively evaluated and the process was demonstrated to be flexible enough for improving the rate and extent of drug release. Additionally, a cost- effective quality product can be delivered to the patients, which is equivalent to the reference standard.

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This is to certify that works embodied in this dissertation entitled **"Formulation Design Development and Evaluation of Lornoxicam Dispersible Tablets"** submitted to the Tamilnadu Dr. M.G.R. Medical University, Chennai was carried out by **Ms.R.Kasthuridevi (261910806)** for the partial fulfillment forthe degree of **MASTER OF PHARMACY** in Pharmaceutics under the guidance of **Mrs. S. SANGEETHA, M.Pharm,** Assistant Professor, Department of Pharmaceutics, J.K.K Munirajah Medical Research Foundation, College of Pharmacy, Komarapalayam during the academic year 2019-2021

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7.SUMMARY AND CONCLUSION

The study was carried to formulate and evaluate dispersible tablet dosage form containing Lornoxicam a Non-steroidal anti-inflammatory drug.

The present study is an attempt to select best possible combination of diluents and disintegrants to formulate dispersible tablet of Lornoxicam which disintegrates within few minutes thereby reducing the time of onset of action.

Mannitol is selected as diluents, Sodium starch glycolate, Crosspovidone, croscarmellose sodium were selected as super disintegrants. Microcrystalline cellulose was used in all formulations in different concentrations. Aspartame as a sweetening agent, Magnesium stearate and Talc as a Lubricant and glidant.

Cross carmellose sodium is used as the super disintegrant in the formulation F1 – F3 at the concentrations of the 3, 4, 5 % respectively.

Sodium starch glycolate is used as the super disintegrant in the formulation F4 – F6 at the concentrations of 3, 4, 5 % respectively.

Crosspovidone is used as the super disintegrant in the formulation F7 – F9 at the concentrations of 3, 4, 5 % respectively.

- Direct Compression method was used to formulate the tablets.
- All the formulations were showed the acceptable flow properties and the precompression parameters like Bulk density, Tapped density and Hausner ratio.
- The post compression parameters like Hardness, Friability, Disintegration time, Weight variation, wetting time, Dispersion time values were found to be within the IP limits.

- The percentage Drug content of all tablets was found to be between 98.3% - 100.2% of Lornoxicam , which is within the limit.

As the concentrations of the sodium starch glycolate increases in the formulations F4 – F6 the disintegration time found to be decreased and the disintegration time for these formulations were 35, 33, 29 seconds respectively and the percentage drug release was also found to be increased for these formulations as 94.12, 94.45, and 99.18 % respectively. From the above results it was found that as the concentration of sodium starch glycolate increased and microcrystalline cellulose decreases the disintegration and dissolution time was found to be improved, so considering the above results it was found that the F6 batch was found to be optimized batch and it pass all the preformulation parameters and evaluation results as per the IP limits

From the data obtained, it is observed from the formulation containing Sodium starch glycolate - 10mg, Micro crystalline cellulose - 106mg in **Formulation F6**, shows Disintegration time in 29 seconds and the Percentage drug release is of 99.18 % at the end of 10 min which satisfied all the tablet evaluation parameters for dispersible tablet. Hence looking at all the satisfactory parameters F6 batch is selected as the optimized batch.

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FORMULATION AND EVALUATION OF LEVOTHYROXINE SODIUM IMMEDIATE RELEASE TABLET

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10 . SUMMARY AND CONCLUSION

Aim of the current research was to develop an Immediate Release Tablets formulation to enhance and ensure content uniformity and dissolution.

Under the preformulation studies, the physical characterization of API, solubility study of API using media alkaline borate buffer (pH 10).) and drug excipient compatibility study was carried out and the result shows that all the physical characterization was found to be as per the monograph, the solubility of API is more soluble in alkaline borate buffer (pH 10) , than any other medium and there is no interaction in drug excipient compatibilitystudy.

Five trial batches (trial 1-5) had been taken to formulate immediate release tablets by changing the concentration of excipients, to obtain an optimised formulation.

The formulated granules were evaluated for precompression parameters such as bulk density, tapped density, Carr's index, Hausner's ratio and angle of repose and the result showed that the flow property was good. F5 exhibited a closer value for all in process parameters and it gives a good result.

The formulated tablets were evaluated for post compression parameters such as hardness, thickness, friability, % of weight variation, disintegration time, dissolution, assay and content uniformity and it was found to be within the Pharmacopoeial limits. F5 exhibited a closer value for all in process parameters and it gives a good result.

F5 formulation was subjected to stability study at accelerated conditions. The first month analysis of physical characters, assay and relative substance were found to be within Pharmacopoeial limits. It is concluded that the formulation Levothyroxine immediate release tablets was found to be a promising substitute for reference product by enhancing and ensuring content uniformity and dissolution.

It is concluded that the formulation Levothyroxine immediate release tablets was found to be a promising substitute for reference product by enhancing and ensuring content uniformity and dissolution.

FORMULATION AND EVALUATION OF CURCUMIN PHYTOSOMES

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8.CONCLUSION

From the experimental results it can be concluded that

- Rotary evaporation method is suitable for preparing the phytosomes of Curcumin than Reflux method.
- Among different drug polymer ratios FB5 prepared by Rotary evaporation method showed maximum drug content than FA5 prepared by Reflux method.
- The percentage drug entrapment efficiency is maximum for FB5 which was found to be 87.61% when compared to the formulation FA5 shows 87.26.
- After carrying out the particle size analysis, the phytosomes were found to be in the nanometer range and showed ideal surface morphology. The average particle size for formulation FA5 prepared by Reflux method was in the range of 152.3 nmand formulation FB5 shows more average particle size of 181.6nm.
- The zeta potential for FA5 was found to be moderately stable, where the formulation FB5 shows moderately stable.
- Formulation FB5 prepared by Rotary evaporation method showed proper controlled drug release after 12 hrs of *in vitro* studies when compared to FA5 formulation prepared by Reflux method. Based on drug content, drug entrapment efficiency, particle size, surface morphology, zeta potential and *in vitro* release FB5 prepared by Rotary evaporation method was selected as a best formulation.
- It was apparent that *in vitro* release of Curcumin showed a very rapid initial burst and then followed by a very slow drug release. An initial fast release suggests that some drug was localized on the surface of the phytosomes. Overall the curve fitting in to various mathematical models confirmed that the *in vitro* release of the all formulation were best fitted into First order followed by Higuchi and Peppas model. The 'n' values are more than 0.5 which indicates that the mechanism in

which the drug release from phytosomes follows Non-fickian diffusion controlled system.

- Stability studies were carried out for the selected formulation FA5 and FB5 prepared by Reflux method and Rotary evaporation method respectively. Stability studies shows that 5 ℃ ± 3 ℃, 30 ℃ ± 2 ℃/40% ± 2%RH conditions are suitable for storing the prepared phytosomes.

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FORMULATION AND INVITRO EVALUATION OF MUCOADHESIVE BUCCAL TABLETS OF LOSARTAN POTASSIUM USING SYNTHETICAND NATURAL POLYMERS

Dissertation submitted to

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FORMULATION AND EVALUATION OF SUSTAINED RELEASE MATRIX TABLETS OF A SELECTIVE ANTIHYPERTENSIVE DRUG

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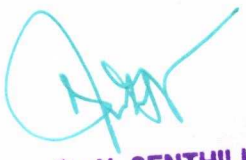

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CONCLUSION

Valsartan is a potent, orally active non peptide tetrazole derivative and selectively inhibits Angiotensin II Receptor type 1 which causes reduction in blood pressure and is used in treatment of hypertension. The objective of the present study was to investigate the possibility of sustaining the valsartan release from matrix tablet prepared by using different concentration of cross linking agents and polymers.

The following conclusions can be drawn from the result obtained.

- The pre-formulation studies like angle of repose, bulk density, tapped density Haunser's ratio and Carr's index of all formulations were found to be within the standard limits.
- FTIR studies revealed that there was no chemical interaction between drug and other excipients.
- The powder mixtures were compressed into tablet and evaluated for post-compression parameters like weight variation, thickness, hardness, friability and drug content. All the formulation batches showed acceptable results.
- The *in-vitro* drug release was studied with USP Type-II dissolution apparatus in both simulated gastric fluid and intestine fluid for a period of 24 hours. Results showed that formulations containing higher concentration of chitosan i.e. F_4 (99.54%) and sodium alginate i.e. F_7 (98.78%) sustained the drug release over a period of 24 hours.
- The *in-vitro* drug release follows first order and indicated that non-Fickian could be the mechanism of drug release.

- Stability studies showed that the tablets formulations were stable throughout the stability period.
- It was concluded that the polymer and cross linking agents plays a major role in the formulation of sustain release matrix tablets of Valsartan. Finally, the study revealed that the release of drug was low when the matrix tablet contained higher concentration of cross linking agents and polymers also showed similar diffusion and erosion kinetics.

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FORMULATION AND EVALUATION OF NEVIRAPINE EXTENDED RELEASE TABLETS

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This is to certify that works embodied in this dissertation entitled **"FORMULATION AND EVALUATION OF NEVIRAPINE EXTENDED RELEASE TABLETS"** submitted in the partial fulfillment for the degree of **MASTER OF PHARMACY** in Pharmaceutics. The Tamil Nadu Dr. MGR. Medical University, Chennai, is a bonafide work, which was carried out by **Mr.SUNDARAMOORTHY.S, (Reg.No. 261910811)** under by guidance and supervision by **Dr. S.CHANDRA, M. Pharm., Ph.D** Professor, HOD Department of Pharmaceutics during the academic year 2019-2021.

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SUMMARY AND CONCLUSION

Nevirapine is a non-nucleoside reverse transcriptase inhibitor (NNRTI) drug which is used in thetreatment human immunodeficiency virus type I (HIV-1) infections. In this study Nevirapine Extended release tablets were prepared by using hydrophobic polymers.

Thirteen formulations of extended release tablets of Nevirapine were developed by using Lactose Monohydrate and Micro crystalline cellulose as diluent and Magnesium stearate as lubricant in different proportions and varying grades of Eudragit, Ethyl Cellulose and povidonein different proportions.

The formulation F12 was found to be best of all the formulations showing drug release matching the innovator product. The formulation F12 was evaluated for all the quality control tests.

Stability study is carried out for 3 months at 25°C; 60% RH: and 40°C; 75%RH, according to ICH guidelines. The tablets were tested for drug release and percentage label claim during the stability period and confirmed that the results were found within the limits.

The identified formula shall be utilized for the formulation development and other studies for successful launching of the product.

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FORMULATION AND IN-VITRO EVALUATION OF PRAZIQUANTEL CHEWABLE TABLET FOR BETTER HELMENTHIASIS TREATMENT

Dissertation submitted to

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In partial fulfillment of the requirements for the award of the degree of

MASTER OF PHARMACY

IN

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9. SUMMARY AND CONCLUSION

The preparation and assessment of chewable tablets of Praziquantel were studied in order to produce Praziquantel chewing tablet. The chewing tablets were created using a direct compression technique with different quantity of binder (PVP K30) and super disintegrants (SSG).

On development of the chewing tablets there were no interaction found in between the drug and excipients which was used during this process which wasagreed by the infra-red spectral analysis. Therefore, all the chewing tablets which was prepared were consistent in drug content.

Results of disintegration studies revealed a quick & rapid disintegration in formulation 5 and formulation 6 as per USP.

In dissolution studies, % cumulative drug release was rapidly increased I formulation 5 and formulation 6. In those two formulations were using less amount of binder and higher amount of super disintegrant. As per USP the dissolution time period is 60 min, meanwhile in that time % cumulative drug release in formulation 5 is 97.50% and in formulation 6 is 98.82%.

The medication quality in all tablet batches was found to be consistent. Friability in all the formulation was found to be less than 1% which indicates the tablet is abrasion.

The Hardness of prepared tablets ranged from 3.82-4.2kg/cm^2.All the prepared tablet

was observed to be uniform in weight, and variation in weight was within the limit of ±5%.

The *invitro* dissolution profile of chewing tablets was found to be increased with increase in super disintegrant level.

Hence, it has been concluded that the amount of super-disintegrants increases and less amount of binder which makes best combination in the tablet formulation containing hydrophilic carriers of drug is a promising approach to prepare efficient chewing tablets of non-aqueous soluble drug Praziquantel.

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FORMULATION AND EVALUATION OF SUSTAINED RELEASE TABLETS OF GEMIFLOXACIN USING NATURAL POLYMERS

A Dissertation submitted to

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8.SUMMARY AND CONCLUSION

The present work to aim the design, fabrication andevaluation of Gemifloxacin sustained release tablets by wet granulation technique. Inthis technique Guar Gum and Xanthan Gum were used aspolymers for drug released upto extended time period.The Formulations F6 found to satisfy the desired criteriafor GFX released from theformulation. The drugs released from the formulationsand released mechanism followed for "first order kinetics& Non-Fickian diffusion mechanism" respectively.Finally to achieve a Gemifloxacin sustained released tablets and drugs released up to 12hrs.

There are several reasons for attractiveness of these dosage forms: provides increased bioavailability of drug product, reduction in the frequency of administration to prolong duration ofeffective blood levels, reduces the fluctuation of peak trough concentration and side effects and possiblyimproves the specific distribution of the drug. If one were to develop an ideal drug delivery system, two prerequisites would be required: Firstly single dose for the duration of treatment whether for days or weeks aswith infection, diabetes or hypertension. Second it should deliver the active entity directly to the site ofaction minimizing the side effects.

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DEVELOPMENT AND EVALUATION OF CLOPIDOGREL BISULPHATE BUCCAL PATCH FOR TREATMENT OF THROMBOSIS

A Dissertation submitted to

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11.SUMMARY AND CONCLUSION

Nine batches of Clopidogrel Bisulphate buccal patches were prepared by using three different polymers (HPMC (ESLV), pectin, sodium alginate).

Based on the physico-chemical parameters such as appearance, thickness, tensile strength, uniformity of weight, drug content and in vitro diffusion studies H2, P4, and S8 were selected as best formulation.

The FTIR graphs of drugs excipients and formulation showed that there is no extra peak or broadening of peaks were observed and thus it indicates that there is no incompatibility between drug and excipients.

From the release kinetic results the r^2 value of H2 was found to be higher in zero order release kinetics. In case of korsmeyer peppas model the result indicated that release exponent 'n' value is 0.45<n>0.89. This indicates that the non fickian type (case – II) diffusion mechanism. The amount of drug released are 97.78% of optimized H2 formulation shows a good release.

The H2 formulation was subjected to stability studies for 3 months. At the end of three months the H2 formulation showed no significant changes in appearance, colour, texture and drug content at both the room temperature and 40 ± 2°C & RH 70 ± 5%.

From the results, it may concluded that the buccal patches of H2 containing (HPMC – ESLV) in the ratio of 1:6 achieved the objectives of quick release, within 60 sec and accurate dosing (97.78%). Thus, the present study delivers the drug constantly & slowly demonstrated potentials for rapid absorption can be effective therapy, and patient compliance for the treatment of thrombosis.

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FORMULATION AND EVALUATION OF CEFUROXIME AXETIL ORAL SUSPENSION

A Dissertation submitted to

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10. SUMMARY AND CONCLUSION

The bitter taste of drugs remains a big challenge to the pharma sector especially when it deals with oral pharmaceutical to paediatric population. Cefuroxime axetil is a betalactum antibiotic used for infections in the urinary tract, sinusitis, otitis media, angioedema, leukopenia, urticaria, seizure, erythema multiforme, renal dysfunction and so on. The highly bitter taste of drug reduces its patient compliance. In the present work the taste masking of the drug employed various techniques like masking with sweetener and flavour, drug particle coating with stearic acid and finally complexation with betacyclodextrin.

The inclusion complex formation with betacyclodextrin proved to be highly efficacious, cost effective and simple method. The drug is entrapped within the hydrophobic core of cyclodextrin thus reducing the solubility of drug in saliva. The complex is thought to separate inside the gastric environment thus releasing the drug. The drug is better absorbed from the upper part of intestine.

The complexation method is the most simplest method. All the formulation parameters were crucially scrutinised and optimised the final formula. This final formula F7 is easily scale up to increase the batch size and less time consumed and fast output in production. The data of drug, complexing agent and optimised formulation confirms complexation. The suspension was taken on a scale up quantity and charged for stability studies. The report of the same has been furnished. The suspensions were evaluated as per USP standards. The in vitro studies of the suspension concludes here. Thus an attempt to mask the bitter taste of second generation cephalosporin antibiotic has been made.

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