Chemotherapy Protocol

BREAST CANCER

VINORELBINE Oral

(Day 1, 8, 15)

Regimen

- Breast Cancer – Vinorelbine Oral (day 1, 8, 15)

Indication

- Treatment of locally advanced or metastatic breast cancer that has failed to adequately respond to an anthracycline or taxane containing regimen or when further anthracycline or taxane treatment is contra-indicated and where venous access is not a treatment option

- WHO Performance status 0, 1, 2

Toxicity

Drug	Adverse Effect
Vinorelbine	Peripheral neuropathy, gastro-intestinal disturbances

The adverse effects listed are not exhaustive. Please refer to the relevant Summary of Product Characteristics for full details.

Monitoring

Regimen

- FBC, U&E's and LFT's weekly for the first three weeks and then three weekly thereafter

Dose Modifications

The dose modifications listed are for haematological, liver and renal function only. Dose adjustments may be necessary for other toxicities as well.

In principle all dose reductions due to adverse drug reactions should not be re-escalated in subsequent cycles without consultant approval. It is also a general rule for chemotherapy that if a third dose reduction is necessary treatment should be stopped.

Please discuss all dose reductions / delays with the relevant consultant before prescribing if appropriate. The approach may be different depending on the clinical circumstances. The following is a general guide only.

Haematological

Prior to prescribing the following treatment criteria must be met on day one;

Criteria	Eligible Level
Neutrophils	equal to or more than $1.5x10^9$/L
Platelets	equal to or more than $100x10^9$/L

Consider blood transfusion if patient symptomatic of anaemia or has a haemoglobin of less than 8g/dL

The initial dose of oral vinorelbine is 60mg/m^2 once a week for the first three weeks of treatment. The neutrophil and platelet count should be checked once a week for these three weeks. If these levels are not sustained consider stopping treatment.

Beyond the third administration it is recommended to increase the dose of oral vinorelbine to 80mg/m^2 once weekly except where the neutrophil count has dropped once below $0.5x10^9$/L or more than once between $0.5\text{-}1X10^9$/L during the first three administrations at 60mg/m^2.

Neutrophil count during the first 3 administrations of 60 mg/m^2/week	Neutrophils More than $1x10^9$/L	Neutrophils $0.5\text{-}1x10^9$/L (1 episode)	Neutrophils $0.5\text{-}1x10^9$/L (2 episodes)	Neutrophils Less than $0.5x10^9$/L
Recommended dose starting with the 4^{th} administration	80	80	60	60

For any administration planned to be given at 80mg/m^2, if the neutrophil count is below $0.5x10^9$/L or more than once between $0.5\text{-}1X10^9$/L the administration should be delayed until recovery and the dose reduced from 80 to 60mg/m^2 per week during the following three administrations.

Neutrophil count beyond the 4^{th} dose of 80 mg/m^2/week	Neutrophils more than $1x10^9$/L	Neutrophils $0.5\text{-}1x10^9$/L (1 episode)	Neutrophils $0.5\text{-}1x10^9$/L (2 episodes)	Neutrophils less than 500
Recommended dose starting with the next administration	80		60	

It is possible to re-escalate the dose from 60 to 80 mg/m^2 per week if the neutrophil count did not drop below 0.5x10^9/L or more than once between 0.5-1X10^9/L during three administrations given at 60 mg/m^2 according to the rules previously defined for the first three administrations.

Kidney / Liver Impairment

Drug	Kidney	Liver
Vinorelbine (oral)	No dose adjustment necessary	Oral vinorelbine can be administered at the standard dose of 60 mg/m²/week in patients with mild liver impairment (bilirubin less than 1.5xULN, and ALT and/or AST from 1.5-2.5xULN). In patients with moderate liver impairment (bilirubin from 1.5 to 3xULN whatever the levels of ALT and AST), oral vinorelbine should be administered at a dose of 50 mg/m²/week. The administration of oral vinorelbine in patients with severe hepatic impairment is contra-indicated

Other

Dose reductions or interruptions in therapy are not necessary for those toxicities that are considered unlikely to be serious or life threatening. For example, alopecia, altered taste or nail changes.

Peripheral neuropathy occurring at NCI-CTC grade two delay treatment for seven days. If the neuropathy is now NCI-CTC grade one or below the resume treatment at a dose of 60mg/m^2 or 50mg/m^2 if 60mg/m^2 was the treatment dose. If the symptoms do not resolve within seven days consider stopping treatment. For NCI-CTC grade 3 and above peripheral neuropathy consider stopping treatment.

For all other NCI-CTC grade 3 and above toxicities defer treatment for seven days and until resolved to NCI-CTC grade 1 or below. Treatment may be re-started using a dose of 60mg/m^2 or 50mg/m^2 if 60mg/m^2 was the treatment dose. If more than seven days is required for symptoms to resolve to this level consider stopping treatment.

Regimen

21 day cycle for 6 cycles

Cycle 1

Drug	Dose	Days	Administration
Vinorelbine (oral)	60mg/m^2 (max 120mg)	1, 8, 15	Oral

Cycle Two Onwards

Drug	Dose	Days	Administration
Vinorelbine (oral)	80mg/m^2 (max 160mg)	1, 8, 15	Oral

Dose Information

- Oral vinorelbine will be dose rounded to the nearest 10mg (up if halfway)
- The maximum dose of oral vinorelbine is 120mg for the 60mg/m^2 dose and 160mg for the 80mg/m^2 dose.

Administration Information

- Vinorelbine is available as 20mg, 30mg and 80mg capsules.
- Vinorelbine capsules should be swallowed with cold water without chewing or sucking the capsule.
- It is recommended to take vinorelbine capsules with food.
- Vinorelbine capsules should be safely stored in the refrigerator away from foodstuffs.

Additional Therapy

- Antiemetics

As take home medication

- ondansetron 8mg to be taken 15-30 minutes prior to the vinorelbine. An additional 8mg may be taken 12 hours later if required.

On cycle one consider supplying metoclopramide 10mg three time a day when required for the relief of nausea. This may be added from the supportive folder in Aria.

- Gastric protection with a proton pump inhibitor or a H_2 antagonist may be considered in patients considered at high risk of GI ulceration or bleed.

Coding

- Procurement – X70.2
- Delivery – X73.1

References
1. Baweja M, Suman VJ, Fitch TR et al. Phase II trial of oral vinorelbine for the treatment of metastatic breast cancer in patients < or = 65 years of age: an NCCTG study. Ann Oncol 2006; 17 (4): 623-629.
2. Frever G, Delozier T, Lichinister M et al. Phase II study of oral vinorelbine in first line advanced breast cancer chemotherapy. J Clin Oncol 2003; 21 (1): 35-40.

REGIMEN SUMMARY

Vinorelbine PO (1, 8, 15)

Cycle One

Day One, Eight and Fifteen

Take Home Medicines

1. Vinorelbine 60mg/m² once a day on days 1, 8 and 15 oral

2. Ondansetron 8mg once a day 15-30 minutes prior to the vinorelbine. An additional 8mg may be taken 12 hours later for the relief of nausea and vomiting

Cycle Two to Six inclusive

Day One, Eight and Fifteen

Take Home Medicines

1. Vinorelbine 80mg/m² once a day on days 1, 8 and 15 oral

2. Ondansetron 8mg once a day 15-30 minutes prior to the vinorelbine. An additional 8mg may be taken 12 hours later for the relief of nausea and vomiting

DOCUMENT CONTROL

Version	Date	Amendment	Written By	Approved By
1.2	August 2014	Header changed Treatment criteria tabulated Metoclopramide dose changed to 10mg Disclaimer added	Donna Kimber Pharmacy Technician	Dr Debbie Wright Pharmacist
1.1	April 2013	Regimen name changed through the document to vinorelbine PO (1, 8, 15). Adverse effects,liver / renal impairment and dose formatted into tables.	Dr Debbie Wright Pharmacist	Alison Burgin Pharmacist
1	Nov 2011	None	Anna Bunch Pharmacist Dr Debbie Wright Pharmacist	Dr Ellen Copson Consultant Medical Oncologist Dr Caroline Archer Consultant Medical Oncologist

This chemotherapy protocol has been developed as part of the chemotherapy electronic prescribing project. This was and remains a collaborative project that originated from the former CSCCN. These documents have been approved on behalf of the following Trusts;

Hampshire Hospitals NHS Foundation Trust
NHS Isle of Wight
Portsmouth Hospitals NHS Trust
Salisbury Hospital NHS Foundation Trust
University Hospital Southampton NHS Foundation Trust
Western Sussex Hospitals NHS Foundation Trust

All actions have been taken to ensure these protocols are correct. However, no responsibility can be taken for errors which occur as a result of following these guidelines.