



**Abstract 122 Figure 1** Heart failure hospitalisations and CV death at six months following SGLT2 inhibition compared to historical controls. There was a significant reduction in the combined composite endpoint of HF hospitalisation and CV death in the SGLT group vs controls (36 vs 54, n=112; p=0.04). There was a significant reduction in CV death in the SGLT2 group vs control (2 vs 11, n=112; p<0.01). A reduction in heart failure hospitalisations was noted; however, this did not reach clinical significance (34 vs 43, n=112; p=ns)

in heart failure hospitalisations and CV death with a significant reduction in QOL outcomes measured by NYHA score. Furthermore, parameters of renal function remained stable following initiation of SGLT2 inhibition.

**Conflict of Interest** none

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#### EARLY AND RAPID INITIATION OF HFREF PHARMACOTHERAPY - A REAL WORLD EXPERIENCE OF A "4 DRUGS IN 4 WEEKS" STRATEGY

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**Introduction** Pharmacotherapy is the cornerstone of treatment for symptomatic and prognostic improvement in heart failure with reduced ejection fraction (HFrEF). Angiotensin-converting enzyme inhibitors or angiotensin receptor/neprilysin inhibitors, beta-blockers, mineralocorticoid receptor antagonists and sodium-glucose co-transporter 2 inhibitors have been shown to provide incremental benefit with marked reduction in mortality and morbidity. Studies have suggested early and rapid titration of all 4 classes of drugs would lead to earlier prognostic improvement, especially in the high-risk period after an acute decompensation. Nonetheless, a significant proportion of patients with HFrEF are either not on an appropriate combination of medications nor optimal doses of medications. We therefore hypothesized that an aggressive and rapid strategy aimed at initiation of all 4 classes of drugs in a four-week period would be feasible and safe. **Method** - Patients were recruited in our study over a 4-month period. Consecutive patients presenting with a de novo exacerbation of HFrEF (defined as severe left ventricular systolic dysfunction, EF<40% as per ESC guidelines) either in the community or following hospitalization were included in the study. All were followed up in a hospital-based heart failure clinic. Patients were seen either by a heart failure specialist consultant or a senior heart failure nurse. No specific predetermined pathway was mandated and clinicians made individual decisions regarding the sequence of drug initiation on a case by case basis. Blood pressure, heart rate and renal function was monitored at each appointment. **Results** - A total of 101 patients were enrolled. 19 were deemed unsuitable for the rapid initiation

#### Abstract 123 Table 1 Baseline characteristic of enrolled patients.

\*=Median \*\*=Mean

Characteristic	
Age (years)*	73
<b>Gender</b>	
M (number, %)	50 (61%)
F (number, %)	32 (39%)
<b>Route of referral</b>	
Hospital (no, %)	43 (52%)
Community (no, %)	39 (48%)
<b>Type of cardiomyopathy</b>	
Ischaemic	23 (28%)
Non-ischaemic	59 (72%)
LVEF (%) **	31%
Diabetes mellitus (no, %)	14 (17%)
Atrial fibrillation (no, %)	37 (45%)
Systolic BP (mmHg)**	127
Heart rate (bpm)**	76
NT-Pro BNP (ng/L)**	5358.7
eGFR (ml/min/1.73m <sup>2</sup> )**	63.3

pathway prior to the initial assessment. Out of 82, 32 (39%) had limitations to the initiation of HFREF medications at the outset. In 50 who were deemed suitable for initiating all 4 drugs, 38 (76%) were able to successfully complete the '4 x 4' strategy. 3 (6%) in this group had significant adverse events during the follow up (symptomatic hypotension, hyperkalaemia and renal function decline).

**Conclusion** - Population baseline characteristics would suggest a relatively high-risk group of patients (i.e. high NT-Pro BNP, high incidence of AF and higher age). This observational real world study has demonstrated that an early and rapid titration is achievable in a majority of patients. The rate of significant adverse effects was low. The delay in initiating SGLT-2 inhibitor medication in diabetic patients would suggest that we need a more streamlined pathway for this group of patients. In order to deliver this service for 82 patients, we needed to have 12 clinic appointments per week for the 4-month period. This has obvious resource implications but arguably, early 'front loading' would lessen the subsequent need for long term specialist input.

**Conflict of Interest** None

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#### OUTCOMES OF NT-PROBNP ASSAY MEASUREMENTS IN SUSPECTED HEART FAILURE IN PRIMARY AND SECONDARY CARE SETTINGS

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**Background** Though N-terminal pro B type natriuretic peptide (NT-proBNP) testing in primary care is integral for evaluating patients with suspected heart failure and acts as a cost-effective gate-keeper to determine patients requiring echocardiography, its routine use in the hospital setting remains variable.

**Aim** 1. Comparison of NT-proBNP testing patterns in primary and secondary care settings. 2. To determine requirements for downstream echocardiography in patients with suspected heart failure in the two settings.

**Methods** 200 consecutive NT-proBNP lab results were reviewed. Data was collected outlining the location of the BNP test (inpatient vs outpatient), accompanying echo and